Growing Concerns: practitioners' positions on engaging in Continuing Professional Development in a deregulated FE and Skills sector

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April, 2020

Abstract:

Educators' participation in formal CPD is declining (UCU, 2016), yet informal, social media-based dialogues are 'burgeoning' in terms of participation and academic interest, (Bergviken-Rensfeldt, Hillman & Selwyn, 2018:230), the rhizomatic online spaces where 'community is curriculum' (Cormier, 2018:1) grow in number. A netnographic study (Kozinets, 2015) was used to analyse activity on Twitter-based educators' communities over a 6-month period. A new model mapping the online community dialogues was devised from the study. The model created shows that thematically, dialogues fall under 3 lenses. The 'Pedagogy' and 'Learning Community' lens discourses show teachers collaborating to build technical and practical wisdom. 'Identity and Voice' lens dialogues speak to educators' praxis-building in demands for agency in CPD choice and desire for holistic, democratic learning experiences for students. Value-laden, political engagement is a key part of participating educators' identities, an alternative doxa emerges. Social Purpose Education discourses oppose both the neoliberal 'learning for earning' agenda (Biesta, 2005:688) and reductive, 'tick box' approaches to students' learning and the judgement of teachers. Focus groups and 1-1 interviews enabled member checking corroborating the value of the '3 lens' model and employed the model as a discursive focussing device. Interview and focus group participants gain valuable learning online from informal social media discourses. Online dialogues somewhat replace a sense of community no longer found where fractional contract working and time pressures have eroded the FE staffroom learning culture. That said, engagement is problematic. Tensions occur and most participants do not formally document informal online activity or disseminate outcomes. Further research is required exploring how we might gather meaningful impacts from informal, ad hoc online learning. FE teachers and teacher educators are encouraged to use the 3-lens model as a comparison tool to reflect upon differences between formal and informal CPD agendas, identifying what might be necessary to professional learning but absent from formal dialogues. Teachers should join social media communities to explore development of authentic digital pedagogies for online informal learning. The sector is urged to revisit and revise the ETF (2014) Professional Standards to promote the importance of individual growth, community engagement, social justice and sustainability in a reframed direction and professional learning agenda for the FE sector.

Thanks and Acknowledgements

It seems appropriate to begin a thesis with significant focus on digital networks by noting that technological innovation is nothing without 'minds and hands' (Hyland, 2018:15) and to take a moment to express heartfelt thanks to my Supervisor, Patricia Spedding, and her colleagues in the *Practitioner Research Programme* (PRP) at University of Sunderland (SUNCETT) for their wisdom and their belief in me as a fledgling researcher.

My ever-patient and supportive husband, Rob, my parents, friends, FE colleagues, welcoming social media educators' communities and the FE teachers and managers who generously gave their time to participate in the interviews and focus groups conducted for this thesis also surely deserve more than this fleeting honourable mention.

Thanks are also due to The Education and Training Foundation who part-funded this research and who initiated the PRP.

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Stimulus for the Thesis: 'Growing Concerns'

An insect suspended in amber, preserved from decay but unable to move, let alone fly. This presents a compelling image of preservation of life with the prospect of future utility when glimpsed in a science fantasy novel. If we transfer this concept of stasis with no prospect of evolution to skills in 'the professions', then the prognosis for professional currency is as disturbing as Jurassic fiction.

We expect those charged with public safety, health and care, the law and education to regularly refresh their knowledge and skills. Further Education (FE) is an essential sector for the individual, communities, employers and the economy and one where, in the case of a majority of professionals, recent research performed by an industry body concludes that professional development is not undertaken (ETF, 2017a) or, for many, is declared as not fit for purpose (ETF, 2018a).

Almost two thirds of FE staff reported engaging in no annual continuing professional development (CPD) whatsoever (ETF, 2017a) and it seems unlikely that the employers responsible for submitting CPD engagement figures would under-report participation. More recently, 38% of respondents to a *Training Needs Analysis* (ETF, 2018a:56) stated that CPD undertaken was 'tick box' to meet organisational or external requirements. Such a shortfall in meaningful professional learning has implications for practitioners' vocational and pedagogical currency and their opportunities to form professional networks. Importantly, adverse impacts upon the quality of provision and therefore on the opportunities provided for learners are likely. In such an important sector participation in CPD, or absence of it is an issue worthy of further research, especially as a commitment to ongoing CPD is a core element of the Professional Standards for FE practitioners (ETF, 2014). The ETF Professional Standards, referred to significantly in this thesis, can be found in Appendix 1.

While participation in formal CPD has been found to be low by some research, vibrant informal learning communities are establishing themselves on social media platforms, 'burgeoning' in terms of participation and academic interest (Bergviken-Rensfeldt, Hillman & Selwyn, 2018:230). Their advent poses questions regarding CPD participation in the sector. We may be capturing a restricted picture gathering data on formal, event-based professional learning only when we ask about CPD participation in FE and is this what is in decline rather than professional learning per se.

This thesis investigates teachers' dialogues in informal, social media-based communities, exploring to what extent discourses result in valuable professional learning. If discourses can be modelled, impactful development can be evidenced and the reasons behind motivation to participate in informal networks can be captured, results can inform future CPD offers in the FE sector.

A Sector of Value and Infinite Diversity

This thesis begins with an overview of learner and educator profiles, curricular frameworks and professional learning in this diverse, significant sector. FE is important for the individual, their community and the country. Positive impacts of engagement in education beyond school leaving age are well-documented. There are 'strong and consistent economic and non-economic benefits' associated with post-compulsory education (BIS, 2013:68). Benefits include improved economic and employment prospects, increased self-confidence and esteem, acquisition of transferable skills, wider community involvement, better understanding of other cultures, enhanced skills transmission to family members, a better ability to manage personal health and greater general wellbeing and

happiness (WEA, 2017:MHF, 2011:Hatch et al, 2007).

FE provision in England exists with as many different titles as there are learning scenarios. What the public might refer to as Further Education, or simply 'FE', has also been named variously 'post-compulsory education', 'post-18 education', 'Vocational Education and Training' (VET), 'Further Education and Training', Further Adult and Vocational Education (FAVE) the 'Skills Sector' and 'Lifelong Learning'. The FE tapestry now includes the strands of work-based learning, Apprenticeship and Traineeship programmes and will be augmented in 2020 with new 'T Level' qualifications. Encompassing 'neglected' learners in the 50% of 18 to 30-year-olds who do not go to university and older non-graduates' (DfE, 2019:5) 'FE' or 'the sector' will be the terms used in this thesis for brevity.

Diversity in FE is also evidenced in the disparate, competing organisations whose provision has threads across work and leisure learning. The sector encompasses large multi-campus General Further Education colleges, Independent Training Providers (ITPs), Adult and Community Education (ACL) provision, work-based learning (WBL) across all industries and public (HMP) and private Offender Learning provision. FE is experiencing considerable landscape change including significant growth in the number of ITPs and third sector organisations operating as independent commercial entities. The current policy environment and associated competitive tendering mechanisms which provide and distribute FE's funding have encouraged contracted-out provision, giving employers greater freedoms of choice in allocation of training budgets. Private expenditure in FE grew by 85% in the ten years to 2010 (UCU 2016:4), encouraging a highly competitive climate in which 'stakeholders work in silos, looking after their own interests rather than what is best for learners' (Policy Consortium, 2018:53).

The FE student body is every bit as diverse as the providers servicing it, going far beyond well-publicised A Level and Apprenticeship programmes. Learners engage in vocational study at Levels 1 and 2 (Level 2 being GCSE equivalent) building readiness for Apprenticeships, unaccredited leisure learning courses, 'HE in FE' (completing Degree or Master's programmes) and undertake study of professional qualifications in a college or equivalent setting (UK Government, 2017a). Over 2 million learners undertake programmes in FE Colleges alone and a third of the Higher Education intake for the 2017 academic year progressed from FE (DfE, 2019). These figures do not include adults learning in the workplace, undertaking community leisure learning or learning independently using online platforms.

The FE workforce displays equally high diversity in educational and professional background, contract type, age and qualification level. For the first time in 2015-16 workforce data was collected from Local Authorities, Independent Training Providers and Third Sector providers as well as the FE, Sixth Form and Specialist Colleges sampled in previous years. The Workforce Data Report reveals that teachers make up almost half of the sector's workforce, half of them employed on part-time contracts, a proportion around 20% higher than the UK workforce in general. Teaching in FE is not a first career for many; the average age of trainee teachers is 37 and almost 40% of teaching staff are aged 50 or older. Approximately three quarters of teachers hold a teaching qualification but for almost half of the workforce, the main subject qualification held is below Degree level (ETF, 2017b).

Research reveals a FE workforce under pressure and susceptible to significant flux. Student-facing staff numbers have remained static over the past 3 years while staff turnover is higher than in many other occupations. Overall, there was a 12% staff turnover rate for FE teachers according to the last available data. This figure masks the fact that in some Apprenticeship scenarios staff turnover was over 46% in a sector area experiencing an annual staff growth rate of over 35% (ETF, 2017b).

A Crucial Sector in Demoralised Decline

A recent review of FE funding (The Auger Review) speaks of a 'demoralised' sector 'crucial to the country's economic success', which is suffering a 'steep, steady… widespread and protracted' decline in funding (DfE, 2019:5). The review recommends further rationalisation of FE's fragmented provision and a prioritisation of 'workforce improvement' as the major barrier to teachers' development is 'simply a lack of money'. The Review suggests that FE requires dedicated capital investment of £1 billion targeted towards pay parity with schools, improvement of facilities and recruitment and retention of a 'greatly enlarged and professionalised workforce' (ibid: 136). It is important to note that these are merely recommendations welcomed by outgoing Prime Minister May in summer 2019 and overshadowed by Brexit uncertainty and the possibility of a change of Government. We need to examine certainties when exploring the state of FE, not future possibilities.

The sector has recently experienced increased demand in terms of student numbers resulting in the number of funded learners rising to 2.2 million (DfE, 2019). The proportion of 16-18-year-olds remaining in education increased to around 75% in 2015 when raising of the participation age required those not in work, on Apprenticeships, Traineeships or undertaking voluntary work to engage in FE full-time. The Auger's Review recommendation of making first level 2 and 3 qualifications available at no cost to help increase social mobility and workforce skills and the advent of the new digital skills entitlement from 2020 (DfE, 2019) may swell FE numbers yet further.

Despite increased student numbers funding cuts are expected to continue, creating a real terms reduction in FE budgets in this decade to 13%, reducing spending per learner by 2020 to just above 1990 levels (IFS, 2017: 31). Compared to school and university budgets, FE finances have undergone what the IFS (2017: 7) call a 'long-run and continuing, squeeze' since 1990 which 'poses significant challenges'. FE spending per learner in 1990 was almost 50% higher than per student in a secondary school; by 2015 it was 10% lower. Compared to primary school spending, it is estimated that FE funding will have fallen from 2.5 times the primary rate to parity by 2020 (ibid: 29).

Given such significant funding cuts at a time of raised provision expectations, it is unsurprising to find FE teachers and their representatives railing against the climate of austerity and opposing decisions to impose further cuts. A letter signed by 17 professors of education, 3 Trades Union secretaries and representatives from more than 20 sector bodies called FE cuts 'an act of vandalism' attacking 'democratic citizenship and equality'. Fears were expressed that an Adult Education service in crisis may not endure past the year 2020; a service which should be 'nurtured' as essential to 'wider educational infrastructure' was being treated as a 'disposable add-on'. Authors called funding cuts 'perverse' when a skilled FE workforce is required for economic growth and criticised policymakers for exhibiting a 'casual disregard' to the 'second chances' and social cohesion which FE enables (FEfunding.org.uk, 2017).

FE staff report that increased student and administrative demands at a time of static staffing levels has raised contact hours and increased the pressure of work. College staff worked an average of over 51 hours per week in 2016. Over 80% of teachers reported that the scope, pace and intensity of their work had increased significantly, and three quarters described workloads as unmanageable at least half of the time (UCU, 2016). Coffield (2008: 25) notes that the 'long, varied and constantly expanding' list of tasks given to the sector 'continues to grow despite repeated reductions in staffing' concluding that 'multiple goals speak volumes for the ambitions that politicians have for the sector, but prompt the question: is it being asked to do too much?'

FE's Purpose and Standards: 'it's all about work'

The snapshot provided thus far of FE reveals a complex sector operating in a challenging climate with diversity in its DNA. Support for those leading or employed in FE is provided by the Education and Training Foundation (ETF), the sector-owned support body since 2013. Backed by the Government, ETF describes its role as:

> '…to support the continuing transformation of our technical and vocational education system by ensuring the sector has world-class leaders, teachers and trainers… ever-improving learner outcomes, provides a better skilled workforce for employers and creates a stronger economy, country and society' (ETF, 2017b).

ETF seeks to fulfil this role by 'improving, driving and championing the quality' of FE leadership and teaching by setting and promoting professional standards, leading workforce development and providing 'key workforce data and research' (ETF, 2017b). The first element of the Foundation's stated role centres on the '*Professional Standards for Teachers in Education and Training – England*', 20 standards formulated in consultation with the sector and issued in 2014. Replacing the Lifelong Learning UK framework in place since 2004, the ETF standards are divided into three domains, 'professional values and attributes', 'professional knowledge and understanding' and 'professional skills'. The standards set expectations of teachers seeking to support them to 'maintain and improve standards of teaching and learning, and outcomes for learners' (ETF, 2014).

The Professional Standards draw upon a report by the Commission on Adult Vocational Teaching and Learning (CAVTL), subtitled 'it's all about work', placing FE's focus firmly on improving learners' employability. Vocational learning is characterised by a 'clear line of sight' to work, underpinned by a '2-way street' of close collaboration between providers and employers (CAVTL, 2013:4). The report casts the model practitioner as a 'dual professional', a specialist in vocational specialism and an expert in teaching and learning. A CAVTL review (CAVTL, 2014) noted 4 key pedagogies required for excellent teaching: development of knowledge, development of skills and practice, practical problem solving and critical reflection as part of a community of practice. A significant thread running through the ETF Standards and the CAVTL findings is the requirement for practitioners to undertake CPD and maintain the networks required for dual professionalism (ETF, 2014).

The Impact of Turbulent Times

Alongside funding cuts, a perfect storm of instability in the shape of significant, sustained change has buffeted FE as 'each new Secretary of State introduced his or her own torrent of legislation' (Coffield, 2008:49). In the last 2 decades, 4 different bodies have held responsibility for funding and overseeing FE (IFS, 2017). In the last 15 years, FE's professional standards have been rewritten 3 times while mandatory minimum expectations for annual CPD have been set, then removed. In the last decade, initial teacher education programmes have been reformed, made compulsory, then deregulated (Tummons, 2015). This climate of 'policy volatility' and 'initiative overload' has done 'more harm than good' (Policy Consortium, 2018:10). The Institute for Government argues that the failure to provide stability in FE is 'systemic', creating 'conditions for failure' through successive Governments' tendency to 'recreate policies and organisations on an alarmingly regular basis' (Norris & Adam, 2017:4). FE remains in 'the midst of such turbulence' (Coffield, 2008:25) Standards are given no opportunity to bed in before being replaced or augmented by further frameworks which now include new digital skills competencies for teachers (ETF, 2019a).

The *Institute for Learning* (IfL), FE's former professional membership organisation, mandated an annual minimum of 30 hours CPD be undertaken (pro rata on contract hours). Since the removal of workforce regulations in 2012, it is no longer a legal requirement for FE educators to declare an annual CPD record. IfL's replacement, The *Society for Education and Training* (SET) requires members to demonstrate a 'commitment' to improving knowledge and skills relevant to their role but mandates no minimum CPD hours (SET, 2016:3). It is important to note that professional body membership is not compulsory for FE staff, unlike many other 'professions'. In summer 2019, around 17% of FE professionals paid to hold membership of SET and around 2,000 trainee teachers, about 2% of the FE workforce, took advantage of free temporary membership (SET, 2019).

Depending on personal philosophy and language use, IfL's 30-hour mandatory minimum for CPD might have been considered positively by some teachers as an entitlement they might claim rather than as an onerous task. SET instead defines 'aspirational provisions' expecting members to 'work towards' the requirements of the Professional Standards, assessing themselves 'at least annually' against them then building a CPD programme based on this audit (SET, 2016:3). The contradiction between the use of Professional Standards in a 'shopping list-based approach' and the ability of an educator to exercise agency as a 'rational-autonomous professional' (Elliott, 1993:16) when identifying and undertaking professional learning will be returned to as a significant theme during this thesis.

FE teachers' CPD: a contested activity

The subject of CPD participation speaks to practitioners' perceptions of core professional identity. The person in the street's responses to questions such as 'who am I?' depends significantly upon to whom the question is addressed (Zahavi, 2005). Where capture of collective responses is concerned, the fact that a sector oversight body was responsible for collecting and collating FE CPD data may have impacted upon results as question responses depend 'to a very large degree on who is asking the question' (Pitt in Meijers 2009:866).

Data was captured on FE practitioners' annual CPD activity for 2015-16 in ETF's *Staff Individualised Records* (SIR) report, the first time CPD activity has been measured since sector deregulation. The SIR report reveals that FE teachers spent 15 hours on average undertaking CPD in that year yet the most notable finding was that over 60% of practitioners reported spending no time on professional development (ETF, 2017a). This finding echoes UCU research from 2016 in which FE teaching staff 'uniformly reported a significant decline in time spent on development activities' (UCU, 2016:6).

ETF's 2015-16 SIR findings were instrumental in my wanting to undertake research into the professional learning of FE educators. FE is a sector overburdened with contradictions. The picture of practitioners' engagement (or lack of it) with CPD is at odds with the ethos of the professional standards to which FE teachers are subject, to the 'model professional identity' those standards presuppose (ETF, 2014:1). In an FE climate of critically restricted funding, increased staff turnover, significant performativity demands and high stakeholder expectations, such significant contradictions need to be addressed. Contradictions 'produce destabilising breaches in the self'; addressing tensions is a 'necessary ingredient' in triggering intellectual creativity as 'fissures nourish creative inspiration' (Scott in Berliner, 2016).

ETF followed the 2017 CPD research with a '*Training Needs in the Further Education Sector'* survey one year later (ETF, 2018a). Published during the writing of this thesis, the research gathered opinions from 481 provider organisations and over 2,300 practitioners, 50% of responses coming from FE colleges, 50% from other post-18 provider types. The Needs Analysis reveals a more optimistic headline finding, concluding that 90% of respondents reported undertaking some CPD.

This banner statistic masks less favourable underlying data. Of the 90% of practitioners who reported undertaking CPD, only 59% reported receiving all the training they required (ETF, 2018a:8). This is perhaps an unsurprising outcome as provider respondents stated that 'ensuring the effective performance of the organisation' was the most frequent driver of CPD; only 18% of providers cited 'the needs of the workforce' as their key driver (ibid:83).

The most worrying finding of ETF's (2018a) research was that a third of practitioners stating they had undertaken CPD reported that some training was of little or no value. Corroborating the employers' voice on key training purpose, 38% of practitioner respondents state that some CPD is of a 'tick box' nature, undertaken to meet organisational or external requirements (ibid:56). The Prevent Agenda, safeguarding, equality and diversity, health and safety and data and administration-focussed sessions are cited as the most common mandatory CPD topics (ibid:9). 68% of staff state that they undertake such CPD solely because their organisation requires them to do so. In stark contrast, practitioners cite 'subject knowledge and teaching' and 'classroom competences' as their most significant target areas for training. Agency is not exercised by most educators regarding CPD choice as only 35% of practitioners state that they choose CPD opportunities for personal benefit. Just 26% of practitioners undertake CPD to build self-identified skills or knowledge (ibid:44) and only 20% of CPD is described as being 'self-initiated' (ibid:50).

ETF's (2018a) research provides limited reasons for optimism regarding the future of CPD in FE. Only 39% of educators consider that they are 'certain or very likely' to undertake training in the next year, perhaps reinforcing the 40% CPD participation figure from ETF's 2017 data (ibid:121). When describing reasons for absence of future CPD participation, 38% of respondents state that they will be too busy and 33% consider that their employer would be unlikely to supply or fund CPD. Fewer than half of the educators surveyed concur that employers allow them to set aside adequate time for professional development and little more than half consider that their organisation has a clear staff development strategy (ibid:121).

Barriers to FE Teachers' Growth

ETF's (2017:2018a) findings on teachers' CPD show inherent tensions between the aspirational targets set out in the Professional Standards (ETF, 2014) and the lived experience of teachers. The drawing out and analysis of these contradictions forms an important part of this thesis.

The reasons behind reported lack of CPD engagement have not been thoroughly researched as the dissemination of sector-wide data on the activity is a recent phenomenon instituted by ETF in 2017. Sources of available FE CPD participation data are significant, based as they are upon opinions of educators responding to an ETF survey and on self-certified data from sector employers. It seems possible that educators not participating in CPD may be equally unlikely to respond to a survey asking for their opinions on required CPD and participation opportunities. This raises the prospect that the 90% participation figure for CPD yielded by the ETF research (2018a) may be inflated. Regardless of this, over 40% of those who did respond reported that they are not receiving the professional learning that they require (ETF, 2018a:8).

There are clearly complex factors at work which affect practitioners' ability or motivation to undertake professional learning. Influences may differ between individuals or be dependent on organisational influences affecting practitioner groups. Factors include mundane, practical and financial factors or political, philosophical, even existential motives bound up with personal and professional identity.

The reduction in CPD in FE is a direct result of increased teacher workload according to Trades Union research (UCU, 2016). UCU conclude that growing time and workload pressures and resultant increases in personal stress impact directly on teachers' capability or motivation to undertake CPD. An alternative perspective advanced by Brown, Edmonds and Lee (2001), concurring with ETF's research on approval and funding (2018a), is that some in leadership roles exercise power to act as CPD 'gatekeepers'. Practical, financial or micro-political power factors prevent educators from being given the permission, funding or cover to enable them to attend professional learning events. Finally, and importantly for this thesis, it is possible that some educators no longer view CPD as a core, or perhaps, significantly, as an achievable, part of their professional role or identity (Tichenor & Tichenor, 2004).

Is a Lack of CPD Options Really the Problem?

As ETF research reveals, the purpose of much mandatory teacher CPD appears to be compliance-focussed rather than promoting individual development (2018a). CPD is centred on organisational performativity issues such as achieving favourable inspection grades or positive outcomes from lesson observations or aims to help delegates meet quality standards required by qualification and professional frameworks (O'Leary, 2012:2018).

Outside individual organisations, there is no shortage of CPD opportunities available to practitioners which align with UCU's (2016: 2) definition of teacher CPD as 'attending and presenting at conferences and networking events, research and reading, self-directed study or scholarly activity'. Organisations such as ETF, The Society for Education and Training (SET) and the Association of Colleges (AoC) offer one-off CPD events and lengthier programmes. Centres for Excellence in Teacher Training (CETTs) and Knowledge Hubs build sustainable practitioner communities crossing organisational boundaries to provide diverse development opportunities such as Professional Exchanges, Practitioner Research Programmes and funded industry sabbaticals aligned to the strategic priorities of the sector (AoC, 2018: ETF, 2018b).

Formal, face-to-face CPD now competes for educators' time and attention with emerging informal networks including 'hybrid' and 'third space' offers until recently employed more commonly in Higher Education (Hulme, Cracknell, & Owens, 2009). Blended and online CPD offers in spaces such as massive and connectivist open online courses (MOOCs and COOCs) and other informal, ad hoc online and social media-based communities are now part of the growing range of learning opportunities available to FE teachers (Roberts et al, 2013). Many of these spaces offer asynchronous 'microlearning' opportunities in addition to, or sometimes instead of, traditional participation formats (Buchem & Hamelmann, 2010).

The Rhizome Pushes Up Through the Soil

Informal educators' communities are referred to by creators as 'rhizomatic' networks (after Deleuze, & Guattari, 1987). In eclectic online dialogues, now 'burgeoning' in terms of participation and academic interest, (Bergviken-Rensfeldt, Hillman & Selwyn, 2018:230) practitioners engage in professional discussions on a weekly theme proposed by members or react to ad hoc topics raised in individual posts. Thematic explorations go against traditional, objective-based models of professional learning 'when community is the curriculum' (Cormier, 2018:1). Several informal social media-based communities for FE teachers now organise national conferences and have worked together to independently publish books on the practitioner experience (ARPCE, 2017). They appear to be thriving in direct contradiction to the ETF data on formal CPD participation (ETF, 2017).

'Online-first' communities are a relatively new phenomenon for FE teachers. The free, informal Twitter-based networks investigated in this thesis have been in existence for as little as 3 and, at most, 6 years. They appear to generate significant energy and enthusiasm in participating educators who engage on an informal, ad hoc, voluntary basis. The communities appear to have the heutagogical foundations described by Blaschke (2012) showing a desire for self-determined learning undertaken to acquire competencies and capabilities but disregarding geographical location and synchronous presence as irrelevant. They bring together individuals which Freire (1993) notes have shared perceptions of reality, common problems and a desire to combine their voices to exert influence. Freire's view that oppression is embedded by traditional pedagogy may be shared by FE educators. Teachers may consider that oppression is embedded through removal of agency if they encounter a requirement to participate in mandatory, performance-focussed CPD which holds little relevance to their role or identity.

The growth of informal online professional networks raises an optimistic possibility that teachers may be engaging in regular informal professional learning, while eschewing formal opportunities to participate in CPD. Trust (2012:134) notes that teachers use online platforms for 'asynchronous learning… whenever they have free time in their schedule'. Online sites provide a space for 'collective knowledge building and sharing' allowing teachers to access support from large groups as individuals can 'pool their answers to find the best solution to a problem… receive feedback on new ideas, discuss lesson plans, ask for support, solve problems, and collaborate'.

This is not to say that the use of informal online learning communities is unproblematic. Trust (ibid:134) acknowledges that sorting through a mass of online information, navigating 'social norms for the activity spaces', and learning to use digital tools may be 'overwhelming'. Effort can be rewarded, however, as online community activity can 'transform the paradigm of the isolated teacher… into a lifelong learner who grows and shares expertise with others'. Trust notes that teachers are motivated to 'contribute to the collective knowledge and help others [to] thrive' (ibid:138).

Educators may not recognise, and so may not formally log or document, informal CPD activities especially if these do not take the form of participation at face-to-face events or are not mandated, approved or financed by their organisation. If themes or perspectives emerge during informal network dialogues which run contrary to sector or organisational orthodoxy, or are critical of current priorities and systems, educators may be even less likely to document community participation.

A Need for Further Research on Informal, Online CPD

My own work over the last 3 years designing curriculum for and facilitating ETF's *Professional Exchange,* T Level CPD (WMCETT, 2018) and accredited programmes for Initial Teacher Education has led me to work with educators from across the FE sector. Some have Master's Degrees in Education, others have no formal teaching qualifications, or are teaching while working towards a first qualification. Some are, or have been, members of professional bodies but the majority are not. All of the educators I work with show a desire to develop knowledge and skills around learner-centred practice and a willingness to engage as career-long learners themselves.

ETF's (2018a) *Training Needs Analysis* was heralded as the first time the sector 'has undertaken such systematic research of this scale, engaging with every level of the workforce' to provide 'crucial baseline data' to inform future CPD (AoC, 2017b). It is of considerable interest that despite the description of the *Analysis* as 'robust and holistic' (AoC, 2017b), the report makes no mention of informal learning, informal networks or communities of practice. The sole mention of social media

use was made by managers and then only as a driver for course marketing (ETF, 2018: 89). The lack of recognition of informal online learning communities in this major workforce survey suggests that my research is both timely and relevant and can contribute new knowledge on emerging forms of professional learning to the sector.

Though some recent research advocates for the value of virtual and social media-based professional dialogues, much of this is performed in the US, Canada or Australia and is focussed on schoolteachers' practice. Concerning the use of Twitter, the microblogging platform and the subject of this thesis, Carpenter and Krutka (2014:414) found evidence of secondary school teachers making 'intense and multifaceted utilization' of Twitter for their own learning, CPD Twitter dialogues being 'more common than interactions with students or families'. They concluded that educators 'valued Twitter's personalized, immediate nature, and the positive and collaborative community it facilitated'. Importantly, they note that many educators valued Twitter's role in 'combating… isolation' as dialogues afforded a 'sense of connectedness or community' (ibid:426). Holmes et al (2013:55) concluded that Twitter 'acts as a valuable conduit for accessing new and relevant educational resources' and as a 'viable means of social support for like-minded educators'. They cite the 'cost effective nature' of the platform which acts as 'a medium for sustained professional development' where participants have 'control and take ownership' of learning'.

Carpenter and Krutka (2014:430) call for further research that 'goes beyond self-reports' to explore how teachers' use of Twitter impacts upon their practice and their students' learning to 'better determine the actual value' of its use. Kjaergaard and Sorensen (2014:1) note that 'digital habitats are likely to enhance learning and motivation' and 'allow new creative ways of working'. They call on teachers to take 'social constructivism into the digital age with a point of departure in connectivism' citing a need for extensive teacher training to allow educators to better devise 'authentic pedagogic designs that utilize personal technologies in rhizomatic networks' (ibid:1).

Lantz-Andersson, Lundin and Selwyn (2018:310) note that 'despite the popularity and prevalence of online teacher professional development, empirical understanding of such communities remains under-developed'. They note (ibid:311) that there is evidence of the value of online communities as spaces where schoolteachers share, filter and curate new ideas and access emotional and professional support. That said, online dialogues may not be 'an expansive process' but rather 'sites for superficial sharing of information… a 'smash and grab' approach to becoming informed' monopolised by a 'small number of core users…exerting undue influence' on interactions (ibid: 311). 'Renewed scrutiny' of online networks is required as there remains 'little informed consensus on their nature, form and consequences' (ibid:303) a shortfall which 'mirrors a lack of knowledge about teachers' informally developed professional learning practices in general' (ibid:304). They note that online networks 'merit further exploration' as areas 'notable by a lack of coverage' include how platforms shape interactions, the role in development of self-identity and professional status and, significantly for this thesis, a 'content analysis of teachers' interactions' (ibid:313).

An interesting self-selecting group worthy of further investigation, educators using online communities for informal professional learning can be considered proactive pathfinders, exercising all-important agency in CPD choice (Sennett, 2009), seeking independent professional network growth and defining their professional identities using the digital domain. Popular, mutually supportive communities may be beneficial to members without necessarily developing critical professional practice. There have been suggestions that informal communities engage in 'comfort radicalism' rather than truly challenging the dominant capitalist paradigm (Avis, 2016). Are we seeing valuable professional learning or simply 'old wine in new bottles' the appetite for which will decline along with its novelty?

What teachers choose to discuss during independent, informal learning, beyond organisational mandate speaks to their core values and their CPD needs. Educators' informal learning choices are a window on their professional identity and desired direction of growth. A model of teachers' informal online learning dialogues would be a valuable new device, adding to our knowledge of the nature and purpose of emerging communities. As a focussing tool, a dialogue model can be used in further research into teacher learning and employed in sector dialogues on CPD and digital pedagogy. Learning about teachers' informal learning can teach us about more formal teacher training and inform formal FE CPD offers, making them more relevant, engaging and accessible for educators.

This thesis provides a critical appraisal of emerging, informal online professional networks, modelling their scope and investigating their value using the authentic voices of participating educators. This practitioner research also asks if informal online learning would be seen as valuable by significant sector stakeholders and, importantly, whether informal CPD is being formally acknowledged and documented by educators undertaking it. Key to this investigation is to establish what is meant by professional learning and how we might establish whether CPD activity is 'effective' and has 'impact'. A review of literature and language use examines these key questions in the next chapter.

Chapter Two: Literature on Learning: Contested Concepts & Identities

Key to establishing whether CPD is being undertaken by FE teachers is to secure an answer to the question 'What is CPD?' This chapter reviews literature around teachers' CPD, exploring professional learning in an FE context. It also addresses another significant issue; if educators are required to undertake effective activities which have a positive impact on their practice, how might we measure effectiveness and define 'impact'? The chapter closes with an exploration of the value of informal professional learning with a focus on communities of practice examining how power dynamics, cultural capital and doxa can impact upon the CPD agenda.

Work on this chapter fulfilled broader personal purposes. The writing allowed me to engage critically with literature to evaluate, reframe and expand my professional identity as a teacher and build my identity as a researcher. Though the efficacy of professional standards will be contested later in this chapter, FE's professional standards contend that practitioners need 'the time and space to reflect, experiment, apply, and generate their own research evidence' if they are to improve their practice (ETF 2017c). Any critical discourse on identity needs to consider use of language and evolutions in meaning and this chapter begins with an appetiser around these issues.

What's in a Name? The Importance of Language Use and Its Evolution

The use of terminology around teachers' development and performance is a matter of considerable tension, a conflict area identified by Coffield (2017) who cautions against thoughtless use of clichéd terms often adopted by Ofsted and Quality Assurance actors. Coffield notes that words such as 'robust' and 'rigorous' have lost denotation as 'official texts have, through overuse, rubbed them smooth of meaning' (2017:43). We need to be mindful in our language use if it is to be meaningful.

When enquiring '*What is CPD*?' or '*What do we mean by impact*? it is important to consider the nature of language. Saussure (1916) holds that the meaning of words is variable depending on context and on the relationship of a word with those surrounding it at time of use. A word, then, has no value in of itself. The metal from which a coin is minted does not dictate its value, its value is signified by place in a currency system, just as the value of a chess piece is dependent on its position at a specific point in a game. Like currency, words make sense only when used in a formal, abstract system and then only when considered relative to the words around them. Every text, according to Saussure, has a deep structure, a unique language, operating via a series of arbitrary signs. Each sign, for example, the word 'impact', is composed of a form, 'the signifier' and a meaning 'the signified'.

Culler (1997) holds that those using a language system require a common understanding allowing all users to respond to a sign in the same way; conflict arises because the 'relation between form and meaning is based on convention' (1997:57). Saussure (1916) notes that diachrony, whereby language undergoes change displaying variance within a system, occurs due to historical events or political influence. Language change lags societal evolution, as language is inherited through tradition which tends towards conservatism. The complexity of language, perhaps particularly in education contexts replete with specialist vocabulary, causes further resistance to change. Culler (1997:59) argues that readers 'can be brought to see through and around the settings of their language', to see a 'different reality'. He advocates for examination of language and meaning change, as when we explore our habitual ways of thinking and 'attempt to bend or reshape them' we 'attend to the categories through which we unthinkingly view the world' (ibid:60).

Meaning Change in the Air for Teachers' CPD

Concepts 'can be slippery' and language may be 'exported from one discourse to another' to 'convey quite a different meaning' (Gregson & Hillier, 2015:111). Bernstein contends that 'every time a discourse moves there is space for ideology to play' and 'no discourse ever moves without ideology at play' (2000:32). The relocation of teachers' developmental dialogues to online spaces may herald a repossession of professional learning discourse and signal opportunities for changes in CPD purpose, even underpinning ideology. Conflicting dialectics around the nature and purpose of teachers' role and professional learning may exist between the approved, official discourses of government and sector leaders and the informal dialogues of teachers (Bernstein, 2000) inviting a 'choosing of sides'.

CPD may have been appropriated by organisations and sector bodies to signify a narrow range of 'approved' activities, which 'promote and legitimize the interests of specific groups of people' dominant in society (Gregson & Hillier, 2015:111). Alternatively, the term CPD may also be undergoing an alternative meaning change, evolving to embrace online, asynchronous discourses in informal communities which respect hierarchy and geography no more than they do time zones. FE CPD may continue but be separated from its signifier, which may speak to educators participating but not formally logging or recognising the activity, especially if CPD is dialogically informal or independently undertaken without organisational mandate.

Language change is not an evolutionary process. There are pivot points when signs undergo a change in accepted meaning and are employed by emerging constituencies for new purposes (Culler, 1997). Language can be subverted, so perhaps we should not be surprised to witness language evolution when our political landscape and national identity undergo significant changes. Culler (1997:60) notes that language is 'both the concrete manifestation of ideology – the categories in which speakers are authorised to think' and the 'site of its questioning and undoing'. It is this 'questioning and undoing', changes, tensions and contradictions surrounding educators' CPD that this thesis seeks to capture. The close of this chapter returns to the themes of dominance, cultural capital and language as a manifestation of ideology; the chapter begins by examining the concept of professionality and teachers' professional learning.

Teachers: Professionals Unlike Others

The term CPD is undergoing competition from other naming conventions; of late 'professional learning' has gained prominence, perhaps as 'development' suggests a deficit to be redressed and as 'learning' importantly 'casts teachers as learners, too' (Kennedy, 2005: 239). Coffield also prefers 'professional learning' describing the activity as the 'major engine of improvement' provided organisational culture is 'as conducive to the learning of tutors as it is to the learning of students' (2017:45). This thesis will refer to teachers' career development as 'professional learning' or 'CPD'.

First it is worthwhile to examine what it means to be 'a professional'. Tichenor and Tichenor (2004:89) note that fundamentally professionals are paid in their roles and are further 'distinguished by the level of skill' setting them apart from amateurs. In medicine, law and theology, a professional has 'clearly delineated roles, responsibilities… codified rules and expectations' for behaviour developed over many years. Importantly, experts in other sectors hold 'shared understandings' of professionalism not present for teachers, so educators must come to a shared understanding of professionalism if their voices are to have authority (ibid:90). Biesta (2015:81) notes that teachers need highly specialised knowledge and skills functioning in 'relationships of authority and trust' as they 'play a crucial role in the definition' of clients' needs rather than merely serving them (ibid:82).

Eraut agrees, noting that professionals 'provide services which recipients are not adequately knowledgeable to evaluate' (1994:2).

Tichenor and Tichenor (2004:89) describe professional teachers as those who are 'true to the intellectual demands of their disciplines', 'know the standards of practice of their profession' and know that 'they are accountable for meeting the needs of their students.' This seems a description which most educators might find familiar, perhaps with the exception of knowing the 'standards of practice of their profession' as these have been far from stable in FE over the past decade. Coffield prefers the term 'expert teachers' and adds to our definition noting that expert teachers 'transcend a narrow 'method and practice' definition' of teaching to consider the 'ideas, values and beliefs by which that act is informed, sustained and justified', extending the concept of professionality to cover 'what the culture values' (2017:4). Coffield (2015:1) further contends that 'educators have a responsibility as well as a right' to become 'equal, social partners with government… in the formation, enactment and evaluation of policy', participating in decision-making 'at national, regional, local and institutional levels'.

The concept of teacher professionalism is at the heart of the ETF (2014) Professional Standards. Practitioners need to be reflective, critical, evidence-based thinkers regarding their 'educational assumptions, values and practice' and 'maintain high standards of ethics and professional behaviour'. The 3 professional domains chosen for the Professional Standards (ETF, 2014:2) of 'values and attributes', 'knowledge and understanding' and 'skills'` appear to sit well with the definitions of professionality already discussed. We can now build on these definitions to explore how expert teachers develop, beginning with an investigation into the meaning of 'CPD' in FE, attempting to relate the arguments to benchmarks set for professionalism by the ETF Standards.

The Slippery Concept of CPD

A text central to this thesis is Sennett's 2009 work, '*The Craftsman'*. Sennett's ideas have a substantial bearing on this work, running through its pages like a mineral seam through rock. Professionalism is a concept replete with tensions and contradictions as there are seemingly as many perceptions of professional behaviour and performance, and the best routes to their achievement, as there are practitioners. Sennett (2009:242) holds that 'higher standards can be pursued in ways that create a great deal of internal conflict' as 'who demands quality can also be divisive'. His ideas will be returned to, but we begin by examining more prosaic definitions of CPD before returning to investigate underpinning philosophical concepts.

The opening chapter of this thesis provocatively offered UCU's (2016:2) limited definition of CPD: 'attending and presenting at conferences and networking events, research and reading, self-directed study or scholarly activity'. While this may be a commonly accepted definition, this thesis will benefit from a broader examination of CPD, beginning with definitions from recognised organisations.

The Chartered Institute of Personnel and Development (CIPD) sets professional standards for learning and development professionals and awards Chartered status. Their pragmatic definition (CIPD, 2017:1) encompasses the process and ethos of CPD as non-prescriptive, personally selected professional learning, yet calls on means-end, instrumentalist ideals:

> *"…a combination of approaches, ideas and techniques that will help… manage… learning and growth. The focus is firmly on results…in the real world… the most important message is that one size doesn't fit all. Wherever you are in your career now and whatever you want to*

achieve, your CPD should be exactly that: yours."

Such independent CPD sounds empowering, however in the section '*How Should I Approach my CPD*?' (ibid:1) conflicts emerge with the ethos above. CIPD describe CPD as most effective 'when coupled with appraisals', suggesting that an individual's development choices be modulated by managers' decisions stemming from a formal performance review.

The CPD Certification Service is an independent, cross-sector accreditation institution which operates to complement 'policies of professional institutes and academic bodies' (CPD CS, 2017). Their definition of CPD encompasses the activity and its purpose, defining it as:

> *"…the learning activities professionals engage in to develop and enhance their abilities. It enables learning to become conscious and proactive, rather than passive and reactive. CPD combines different methodologies… all focused for an individual to improve.'*

Though the improvement focus suggests a deficit model, the 2 definitions above give us a picture of CPD in which individuals exercise agency with the specific purpose of professional growth and skills enhancement. Sennett approves of the notion that agency is key. He considers that each person must be their 'own maker', developing practice experientially, taking charge of their own narrative (2009:72). Sennett contends that when workers exercise agency 'skill develops within the work process… connected to the freedom to experiment' the new skill is measured by 'standards of inner satisfaction, coherence, and experiment in craft." (2009:27)

Sennett's focus on agency speaks to principles of heutagogy outlined by Blaschke (2012) of self-determined learning, undertaken to enhance competencies and capabilities. That said, the concept of teacher agency is problematic as agency 'remains an inexact and poorly conceptualized construct in much of the literature about teaching' (Priestley and Biesta, 2015:5). The debate around teacher agency is an important one which will be returned to later in this thesis.

Build a Community, Link Theory to Practice

When investigating teachers' CPD, we might begin by exploring what unique characteristics educators' professional learning might possess. Whitehouse (2011:10) identifies six underpinning characteristics: CPD activity should be based on identified learning needs, be sustained, be subject-specific, be classroom-based, should involve collaboration and should use external expertise if appropriate. Whitehouse recommends an iterative CPD process allowing 'time for personal theories to be challenged and teaching practices to be changed' through participation in professional learning communities which can be 'informal in nature'.

By extending her definition of CPD to encompass a need for community and collaboration, Whitehouse concurs with Bruner (1996:11) who contests that 'culture shapes the mind', providing us with the 'toolkit by which we construct not only our worlds but our very conception of ourselves'. Bruner holds that thinking is not a solitary activity; critical peer dialogues aid the determination of educational philosophy and practice. Wenger also promotes a need for collaboration in teacher CPD, as 'communities hold the key to real transformation' through 'engagement in action, interpersonal relations, shared knowledge, and negotiation of enterprises' (1998:85).

The need for educators to be collaborators is addressed by the ETF Professional Standards in standards 6, 10 and 20 which require teachers to 'build positive and collaborative relationships with colleagues', 'evaluate their practice with others' and 'contribute to organisational development and

quality improvement' through collaboration (ETF, 2014:2). In standard 20 we see a similar conflict to that found in the CIPD's definition of CPD, one of an individual's agency being modulated by organisational priorities. Where CPD is mutually beneficial to educator and employer, committing to it can be thought of as a 'win-win' scenario; where a mandated activity is not considered personally relevant by the teacher, tensions and motivation issues may occur and these conflicts will be discussed later in this literature review.

The concept that professional learning is best situated within a community is also central to Sennett's (2009) thesis. Social order plays a key role in craft development and teaching is surely a craft described by Wiliam (2009) as 'such a complex craft that one lifetime is not enough to master it'. Sennett (2009:288) calls on Dewey, Ruskin and Morris in urging workers to assess the quality of work 'in terms of shared experiment, collective trial and error'. From medieval craft guilds to contemporary LINUX programmers, Sennett holds that craft has always 'joined skill and community', requiring a communal ethos and social structure for skills development to occur (ibid:51).

There is also a beneficial, defensive element to the commune when rebutting challenges to professionality, worth or achievement. Sennett notes that without community, artists lack 'a collective shield… against [clients'] verdicts' (ibid:67). Opportunities to work collaboratively with colleagues in 'peer-to-peer activities' are also thought essential by Coffield (2017:45) who considers that key to practitioners' development is the 'professional confidence to challenge the assumptions, methods and findings', here of the Inspectorate, in a 'career-long, ongoing process'.

Sennett holds that skill development depends on 'relational thinking… attends to clues from other people' in a 'dialogue between tacit knowledge and explicit critique' (2009:51). Sennett draws upon Polanyi 's assertion that tacit knowledge is important, and that conjecture should be explored in community dialogue. The emergence of a hunch or informed guess shows that professionals 'believe more than we can prove' and 'know more than we can tell' (Polanyi, 1967:4). A professional may not be ready to formally articulate emergent ideas, but Polanyi considers that this does not make informal conjecture uninformed; emergent ideas help us to make meaning and develop theory.

Dialogue and Theory Progress to Practical Action

Community alone is not enough to develop practice and we should not expect professional learning to occur through random proximity effects. Coffield (2017:xii) notes that collaboration must be actioned in a practical sense, not remain discursive. Teachers need to learn new methods collaboratively in peer-to-peer activity or they will be 'sharing, but not implementing, good practice' (2017:xiii). An advocator of agency as well as community, Polanyi (1967) considers that motivation drives skill and passion motivates discovery, leading us to identify patterns, ask significant questions, then validate theories using peer critique. The theme of interconnected duality of theory and practice is furthered by Deleuze (in Foucault, 1977:208) who holds that theory is 'exactly like a box of tools… it must be useful'. Deleuze (ibid:206) suggests we view practice as 'a set of relays from one theoretical point to another' and 'theory as a relay from one practice to another'. Theory has relevance only to a limited field as 'no theory can develop without eventually encountering a wall… practice is necessary for piercing this wall'.

Critical dialogue around practice is an essential component of CPD. Coffield (2017:41) writes of the 'transformative change' of collaborative strategy when teachers 'change how they think instead of what they do', 'generate new knowledge… and this provokes new actions'. Coffield draws on Polanyi's theory that the 'act of knowing exercises a personal judgement in relating evidence to an external reality, an aspect of which… [the professional] is seeking to apprehend' (1967: 4).

A Process, Not an Event: CPD as Patient, Career-Long Work

There is a need for patient building and judging of professional practice. Aristotle's description of excellence (in Durant, 1991:76) as 'not an act but a habit… won by training and habituation' reminds us that 'we are what we repeatedly do'. Those seeking to develop a skill 'must be patient, eschewing quick fixes' says Sennett (2009:51) while James and Biesta urge us to appreciate complexity, positing that gradual changes in embedded practice and culture ask for 'contextualised judgement' rather than 'general recipes' (2007:37). Coffield joins them in warning teachers away from 'simple but spurious solutions to the complex problems of teaching' (2017:4).

Coffield holds that CPD must occur as a 'sustained, coherent programme over which [educators] have control' (2017:45). Whitehouse (2011) concurs, stating that professional development is a challenging, iterative process which benefits from persistence. Repetition and need for patience emerge as significant themes in craft-building which involves, 'dwelling on a task for a long time and going deeply into it, because you want to get it right' (Hyland, 2018: 10). Sennett (2009:37) concurs, holding that 'going over an action again and again… enables self-criticism'. He notes that contemporary education 'fears repetitive learning as mind-numbing' but warns against replacing repeated practice with constant novelty as absence of repeated practice deprives learners of the experience of 'studying their own ingrained practice and modulating it from within' (ibid:38).

Sennett is specifically referring to school and college students when cautioning against unquestioned innovation, but it is significant that teachers undertaking CPD seem not to be considered equally as 'learners', though surely they are. Coffield questions whether educators have the 'resources, time and space to grow as professionals with equivalent freedoms to their students' (2017:36). He describes both teacher and student as needing the metacognitive skills to become 'lifelong learners who understand how to learn', and can 'assess their own weaknesses, strengths and enthusiasms.'

Given the stated needs for patience and persistence in craft building, it seems notable that outstanding teachers are often promoted into management positions with undue haste, moving beyond a sustained learning and mentoring cycle. Removal from skilled and experienced peers coupled with high staff turnover rates in FE may compromise the relationship continuity required for participation in a 'cognitive apprenticeship' (Rogoff, 1990 in Gregson & Hillier, 2015:115). Bathmaker (2014, in Gregson & Hillier, 2015:115) holds that cultures can act to 'enable or constrain learning'; professional learning constraint may result when FE staffrooms have a revolving door by virtue of promotion or attrition, or, worse, both.

Coffield (2008) also takes issue with Ofsted's (2014) call for a 'corporate approach' to CPD, contending that CPD should be autonomously selected and personalised as educators are best placed to identify their own learning requirements. O'Leary (2018:3) agrees, criticising any 'reductive view' of teaching, which assumes that practice can be 'uniformly identified, categorised and assessed in predictable and proportionate ways' by managers and inspectors seeking 'normalised practice' from a 'homogenous community'. This view is shared by Scales (2012:3) who calls for the end of 'sheep dip' CPD 'events', attended en masse and 'probably hosted by an outside provider' who may not know 'anything about' the teachers' work. Scales describes large-scale events as having corporate popularity because they are easily auditable but concludes that generic, event-based CPD is 'probably a waste of time and money' as teachers are best placed to know about their local needs and, like their students, require 'personalised learning'.

Scales (2012:1) quotes Wells (1987) in holding that every educator needs to become 'a builder of theory that grows out of practice' as for too long, 'experts' from outside the classroom have told teachers 'what to think and what to do.' Scales directs particular criticism towards 'best practice…

take-aways' where learning from generic events is incorrectly considered to be transferable to other scenarios, noting that 'context-free' CPD has negligible value as it is may not translate to other contexts. Professional learning should, therefore, be underpinned by principles of andragogy (Knowles, 1984) being intrinsically instigated, built upon independence and self-concept, experiential and task-orientated with immediate application.

Building Praxis: Practical Wisdom, Informed by Values

The concept of 'best practice' is acknowledged to be slippery by teachers and teacher educators, if not always by those dictating policy, as the idea embraces the values which inform teaching. Kemmis et al (2014:25) dispute any teacher-as-technician standpoint that imagines educators working with 'pliant… raw materials that are the students themselves' to 'produce outcomes'. Instead of considering learning a mechanistic process, we must consider impacts of learner agency and educator action, remembering the 'practical actions' required in response to 'uncertain practical questions' (ibid:25).

Biesta (2010:10) reminds us that education is an unpredictable, 'variable process'. This unpredictability is perhaps particularly prevalent in vocational education situated as it is in garages, restaurants, nurseries and theatres. Likening teaching to an art or craft discipline (such as mastering an instrument) Biesta echoes Sennett (2009) in holding that classroom practice requires subtle judgements, calling for what Aristotle terms 'phronesis' or 'practical wisdom'. Biesta contends that expert teaching is forged from career-long development so a practitioner must draw upon the 'embodied' qualities of the 'whole professional person'. Pedagogy, then, can be thought of as a 'way of acting and being' while judging the 'right thing to do' for each individual learner (Biesta, 2010:10).

Dunne (1993:8) explains phronesis as having an 'eye… an intuitive sense of the… texture of practical engagement' and Heilbronn notes that practical wisdom 'arises from experience and returns to… reconstruct and enrich' it (2011:48-9). Heilbronn also notes (2011:48-9) that practical wisdom develops by 'grappling' with messy reality, considering expert educators as having the capacity to respond flexibly in fluid situations 'to do the right thing at the right time'. Practical judgement, providing 'the right response', transcends technical ability to draw upon ethical codes and personal values, showing a 'rootedness' of action within the individual's 'character, disposition and qualities'(ibid:49). This ability of an educator to make flexible, informed decisions is described by Freire (1998:41-42) as 'absolutely necessary' to expert pedagogy requiring the teacher to be unafraid of risks, to 'reject immobility'.

Kemmis et al (2014:26) hold that educationally wise actions do not follow rules aimed at producing outcomes known in advance; they are instead actions whose 'indeterminate' results can be evaluated only by reflecting upon 'how things actually turn out'. A teacher's 'sayings' (the cultural, discursive language they use), 'doings' (their physical activity at work) and 'relatings' (their social-political arrangements) form a 'practice architecture' (ibid:34). Once practice is 'morally committed… informed by traditions in a field' and aims to work 'for the good of those involved and for the good for humankind', this action can be said to be 'praxis'. Kemmis et al note (ibid:26) that the concept of praxis reaches back to Aristotle and can be understood as 'living well in a world worth living in' (ibid:27) a view echoed in Humboldt's concept of *Bildung* which calls for 'autonomous participation and communication in the public sphere' focussed on 'development of the inner self, which in turn served the common good' (Heidt, 2015:4).

'Delivering' CPD: Experts and Outcomes

The literature review to this point presents an ideal of professional learning as a considered, values-informed process in which an educator exercises agency and collaborates with peers. We should now explore how we might judge whether CPD has been effective, which requires that we ask, 'effective to what end and for whom? This discussion involves attempts to assess impact and brings with it agenda-laden complexity, requiring us to define what is meant by effective and to assess attributes of quality teaching and learning. Such judgements return us to discussion of the complexities of language use (Saussure, 1916: Culler, 1997) as we seek to interpret observations of practice and data on learner outcomes. Gregson et al (2007:83) note that the ways in which data is collected and the scale and instruments used in its evaluation 'have a bearing on the way in which data can be reported upon and the different claims… about reality and truth.'

Nuances of language use and intended or symbolic meaning come into play when considering the effectiveness of CPD and an essential first question is 'what is the purpose of CPD?' It is useful at this point to consider Kennedy's (2005) analysis of core CPD purposes which examines issues of power, control, teacher and profession-wide autonomy and 'potential capacity for transformative practice' (2005:2). Kennedy suggests 9 CPD models which span purposes she categorises as transmission, transition and transformation (ibid:17), useful lenses through which to examine the current FE CPD agenda and the motivations of those who set it.

The Department for Education's '*Standard for Teachers' Professional Development*' (STPD) (DfE, 2016) gives insight into the Government's preferred direction and purpose for CPD. The 'clear description' of effective CPD set out in the STPD involves school leaders, teachers and external experts acting 'in concert' (Teacher Development Trust, 2017:1). Developed by 'experts' including teachers, school leaders, business managers and researchers, STPD development began with a review of standards worldwide across a range of professions. The Standard comprises 5 key headline ideas; all CPD should have an explicit 'focus on improving and evaluating pupil outcomes', 'be underpinned by robust evidence and expertise', 'include collaboration and expert challenge', 'be sustained over time' and be 'prioritised by leadership'. There is also an expectation that individual CPD activities will be 'threaded together' to create coherent programmes (ibid:1).

An Ofsted document focussing specifically on FE teachers' learning stresses the need to use professional standards as a 'basis for promoting… better practice across the sector' (2014:8). Outstanding providers are said to use key strategies of 'promoting professional dialogue' and 'consistently taking a corporate approach' to high quality (ibid: 11). Quality, according to Ofsted is achieved by 'rigorous performance management' linked to observation of learning. Lesson observation outcomes inform performance management processes which initiate 'individualised and successful' CPD (ibid:22).

The Ofsted and DfE documents draw upon frameworks for evaluating CPD effectiveness which have a commercial or Higher Education focus (Guskey, 2000: Kirkpatrick, 1998: Chalmers and Gardiner, 2015: Trigwell et al, 2012). The DfE (2016) and Ofsted (2014) report authors identify multiple indicators for CPD impact including participants' reactions to the development, learning stemming from it and changes to attitudes and beliefs. Both models place strong significance on whole organisation or cross-sector benefits and improvement in outcomes. CPD built on performance management suggest an ethos philosophically underpinned by a 'deficit model' whereby organisational standards are raised via individual performance management. Kennedy (2005:6) notes that use of a deficit model is problematic as it is unclear 'whose notion of competence' performance standards reflect. The model also disregards notions of systemic performance

shortfalls; the organisation itself is 'not considered as a possible reason for the perceived failure' so the model fails to 'take due cognisance of collective responsibility' (ibid:7).

Use of independent experts and outcome-focussed metrics when steering CPD also aligns with Kennedy's (2005:4) 'training model' which requires teachers to 'strive to demonstrate particular skills specified in a nationally agreed standard'. Kennedy notes that a training model favours a 'technocratic view of teaching' centred on demonstration of competence. Training is 'delivered' to the teacher by an 'expert'; the agenda is 'determined by the deliverer' and the teacher is 'placed in a passive role'. Kennedy (ibid:4) is critical of this model as it disregards classroom context and fails to connect with the 'essential moral purposes' at the 'heart of professionalism'. She notes that a 'high degree of central control' is evident in the training model which is 'often veiled as quality assurance'.

The Ofsted and DfE standards hold some benchmarks for successful CPD in common with Whitehouse's (2011) and Bruner's (1996) theories (such as use of external experts and the desirability of collegiate dialogue) but significant contradictions with other literature are evident. Whitehouse (2011) finds explicit focus on learner outcomes as a success metric problematic, noting that establishment of cause and effect between CPD and improvements in learner outcomes is challenging. Coffield, too, holds that there is a 'serious weakness' in the theory that effective teaching is defined as 'that which leads to improved student achievement'. An outcomes focus 'boils down to better exam results [so] education is reduced to what can be easily measured' (2017:4). Coffield quotes Fielding (2001) in warning that 'accountability has become a largely negative instrument of social and political control operating within the culture… of blame' contending that to measure quality improvement meaningfully we must move away from 'judging the more easily measurable outputs of education' lest 'audit become a form of learned ignorance' (2017:33). Coffield's criticism echoes that of Stenhouse (1976:4) who holds that an 'objectives model' of curriculum shaped by 'the concerns of examiners rather than teachers' fails to foster the 'educational experimentalism' required for teachers' professional growth (ibid: 6).

The dominance of an objectives model of curriculum poses a challenge to the credibility of informal professional learning if informal CPD activity cannot produce ready data on improved learner outcomes to feed an audit culture. Though grade improvements and similar 'hard' indicators of impact have been criticised as 'necessarily crude… disguising instances of significant success or failure' (Gardner, Holmes and Leitch, 2008:89), providing the types of hard evidence favoured by sector leaders and policy makers is a challenge for advocates of informal learning. Though 'measurable and observable are not equivalent', short-term change can be 'implausible or difficult to observe', leaving researchers to attempt to persuade stakeholders using soft indicators of impact if 'conventional quantitative and qualitative evidence is rendered impractical' (ibid:89).

Professionalism Cedes to Organisationally Mandated Qualifications

The deregulation of FE through the removal of a requirement for mandatory teaching qualifications meant that 'employers and individuals' are given 'flexibility to choose the most appropriate qualifications for practice' (LSIS, 2013;5). A statement in the same LSIS document contradicts any teacher-employer decision-making partnership ethos, elaborating that 'it will be up to employers to decide what [qualification] is appropriate for their staff'. Employers should 'specify the qualifications that they require their teaching staff to hold' and then determine what CPD is appropriate (ibid:4).

One way that sector educators are encouraged to reflect upon their professional values and demonstrate mastery of practice is by becoming a member of the *Society for Education and Training.* They may then elect to pay further fees and work towards '*Qualified Teacher Learning and Skills'* status (QTLS) 'the badge of professionalism' or '*Advanced Teacher Status'* (ATS) 'the badge of

advanced professionalism and mastery' (SET, 2018b). The conferment of QTLS or ATS aligns with Kennedy's award-bearing model (2005:5) wherein CPD is 'focused on classroom practice, often at the expense of issues of values and beliefs'. Like Kennedy's deficit, training and cascade models, the award-bearing model is situated in the 'transmission' category of her framework and witness requirements for professional learning 'defined by some external party, usually in a position of power' (ibid:18). Kennedy notes that the purpose of transmission CPD is to equip educators with the 'requisite skills to implement such reforms as decided by others' rather than allowing them to be the arbiters and architects of a practice they construct based upon their own judgement, values and identity (ibid:18). Sennett's argument (voiced in the appetiser in this chapter) bears repeating here: 'standards can be pursued in ways that create a great deal of internal conflict' as 'who demands quality can also be divisive' (2009:242).

Tensions caused by conflicting CPD priorities and power dynamics are evident in FE. An integral part of the year-long QTLS/ATS process involves candidates self-assessing against the ETF Standards (2014) and demonstrating professional development based on observation feedback, observations which, it is encouraged, are performed by a senior manager (SET, 2018b). It can be argued that a teacher will respect feedback from an experienced, subject specialist peer above that of a senior manager as teacher and manager may lack a shared perception of professional or organisational identity, purpose or values (Coffield, 2008: O'Leary, 2018). Ideological conflicts are a source of tension when deciding on CPD direction. We might question whether teachers are being required to reflect on professional values they have framed personally or are being asked to modify their identity to better fit organisational ethos or political climate.

Priestley and Biesta (2015:1) hold that 'several decades of policies' have 'actively de-professionalized teachers through highly prescriptive curricula and strict regimes of inspection and control'. They further contend (2015:3-4) that it is 'highly debatable whether the rhetoric of [teacher] autonomy is borne out in practice'. Increase in 'output regulation' has resulted in development of 'performative cultures… and instrumental decision-making' compelling teachers to 'distance themselves from their personal values in order to 'play the game'' (2015:3-4).

Setting Standards for Excellence or Homogeneity?

Arguments for the need for professional standards as benchmarks for quality and foundations for CPD have certainly been made. Darling-Hammond (1999:15) notes that professional standards 'clarify what the profession expects its members to get better at' and should be 'profession-defined' to provide a basis on which 'the profession can lay down its agenda and expectations for professional development and accountability'. Darling-Hammond notes that in teaching, standards help to 'structure the learning opportunities that reflect the complex, reciprocal nature of teaching work' but also 'hold promise for mobilizing reforms' (ibid:39). Sachs (2003: 179) contests that standards improve performance and professional standing, contributing to learning and setting 'goals and exemplars of best practice' for teachers.

Sachs (2003:178) highlights an important point when discussing the validity of US teacher standards. The appetite for their imposition was 'premised on the assumption that standards are developed by members of the teaching profession' and created 'over an extended period… with co-operation from various teacher representative bodies'. The *Society for Education and Training* (SET), the FE sector's membership body note that over 1,000 sector professionals were consulted during formulation of the ETF standards (SET, 2016). SET provide the rationale that standards 'provide a framework for teachers… to critically appraise their practice and improve their teaching through CPD' (SET, 2016). This statement firmly links the standards to the steering and mapping of CPD but further suggests

that teachers may exercise agency, acting as the appraisers of their practice and architects of their professional learning.

Kennedy (2005: 8) observes that a semantic shift has occurred whereby judgements of teachers' performance against a framework of 'competences' has now been superseded by benchmarking against 'standards'. Such a change may appear to place an emphasis on values and beliefs, speaking to the recurring theme of the nuances of language use in this thesis. Bernstein's contention (1996, in Gregson & Hillier, 2015:111) that a shift in discourse makes 'space for ideology to play' seems apposite. Kennedy notes that though terminology has changed, little difference is observable in 'either philosophical or practical terms' when judging teachers' practice. Though language has, 'shifted to hint at issues of values and commitment… the real test is in the implementation' (2005: 8). She contends that the emphasis of teachers' standards remains firmly on 'evidence-based, demonstrable practice' rendering standards 'competence-based, despite claims to the contrary'. Kennedy further contends that instrumentalist standards 'belittle the notion of teaching as a complex, context-specific, political and moral endeavour', inviting means-end relationships which 'empirically validate connections between teacher effectiveness and student learning' (ibid: 9).

Kennedy (ibid:9) concurs with Sennett (2009) in contending that a benefit of standards is that they 'provide a common language, making it easier for teachers to engage in dialogue' about their practice. Her concern, however, is that use of performative standards reduces the likelihood that a range of alternative forms of CPD will be considered. She holds that a reliance on a 'behaviourist perspective of learning, focusing on the competence of individual teachers' has risen to prevalence at the expense of 'collaborative and collegiate learning' causing us to fail to respect teachers' 'capacities for reflective, critical inquiry' (2005:10).

Other authors question the use of standards as a precursor to effective CPD planning or guarantee of improvements to practice. Research on global teachers' professional standards performed by ETF, revealed significant ambiguity around standards efficacy as 'the catalyst for [standards] development almost always seems to have been the identification of a need to achieve consistent quality in teaching' (ETF, 2013:6). The choice of the term 'consistent' rather than 'higher' quality here is telling. ETF state that the primary focus of standards has been 'to provide a basis for consistent and relevant initial training, supporting ongoing professional development' and concede that standards are usually 'initiated by government bodies' rather than by the profession. The ETF research closes with a striking conclusion, given its commissioners, purpose and audience, finding that in the UK, use of standards 'had not resulted in consistency in the quality of teaching provision' and that initial teacher training informed by standards 'was often… haphazard and onerous' (ibid:8). Furthermore, ETF note that we must consider whether standards work to 'develop high aspirations rather than compliance with minimum requirements' and whether they are 'best driven by a practitioner led body' (ibid:19).

Given ETF's (2013) findings, we should examine the efficacy of standards in more depth; Sachs suggests we ask whose interests are served by them and suggests (2003:176) that standards' true purpose is as a control mechanism deploying 'bureaucratic… rules, mandates and requirements'. She contends that standards give governments, via regulatory bodies, the ability to exercise 'direct supervision' and to impose standardised processes to 'control or regulate teaching'. Sachs is critical of arguments for the efficacy of standards, firstly, as being plain 'common-sense', secondly as an automatic method of quality assurance and, importantly, as the preferred engine for quality improvement. Sach's rebuttal is a useful frame to employ to explore other literature on the imposition of professional standards.

Professional standards are positive, beneficial instruments. This assertion is presented uncritically by the media according to Sachs (2003:176) who claims that the public is assured that imposition of regulation will improve quality. She cautions that 'what might be seen to be common-sense has significant implications for teacher autonomy and professionalism'. An ideological struggle presents between those who regard professionals as autonomous actors with strong identity and those who contend that independent, experiential approaches compromise quality. Sennett (2009:50) notes that Plato 'treated with suspicion' experiential craft standards, describing them as 'too often an excuse for mediocrity'. Plato doubted the value of the interchange between tacit and explicit knowledge and Sennett (2009:51) holds that this doubt remains an enduring tension.

The second commonly quoted benefit of standards relates to another of Plato's arguments (in Sennett, 2009:50) regarding quality assurance; standards bring consistency of performance through uniform practice. Sachs (2003:179) cautions against acceptance of this assertion. She contends that in education, standards can empower 'overly zealous gatekeepers' causing a 'massive teach-to-the-test response' that may divert improvements in teacher education and 'dumb down high quality, innovative programs'. Darling-Hammond (1999:39) agrees, stating that standards 'are not a magic bullet' for raising quality, holding their own dangers if practice becomes 'constrained by the codification of knowledge' and further contending that those applying standards may fail to 'acknowledge legitimate diversity of approaches or advances' (2008:50).

Polanyi is quoted by Sennett (2009:50) cautioning against unquestioning linking of quality to uniformity, noting that 'bedded in too comfortably, people will neglect the higher standard' as 'by arousing self-consciousness' workers are 'driven to do better'. Using the NHS as his example, Sennett highlights the tension between 'correct form' and embedded practice (ibid:242). Standards prescribing a 'correct procedure' may raise quality in some areas, but not universally as in means-end scenarios we witness 'the problems of the closed system' when those undertaking development meet the appointed target but do not progress further. Sennett notes that to do good work professionals need to be curious, to 'investigate, and to learn from ambiguity', echoing earlier thoughts benefits of repetitive practice he further holds that skill is built as 'the rhythm of solving and opening up occurs again and again' (2009:48). Avis (2017:198) concurs and asks us to consider the pressures that overworked teachers find themselves under if compelled to meet standards-related targets. If teachers' labour is 'not freely offered' once targets are met there may be no impetus or attempt to exceed them. He further contests that in 'oppressive and low-trust work contexts', targets may be fabricated by managers 'negotiated on what has already been achieved'.

Sachs (2003:181) contends that the imposition of standards may also leave 'silent the assumptions about how change will occur and what model of change is implicit'; if organisations adopt a bureaucratic, 'personal change-forced perspective' we may create 'regimes of direct supervision and standardized work'. She cautions (ibid:133) that standards may reduce 'areas of personal discretion' and 'inhibit involvement in and control over longer term planning' and, concurring with Coffield (2009), may foster dependency on 'externally produced materials and expertise'. Sachs (2003:133) holds that instead of performative benchmarks we should empower educators to be able to 'rely on standards of expertise, codes of conduct, collegiality, felt obligations and other professional norms…to build a community' which will enable professional learning to occur naturally.

The most contentious outcomes of the use of performance standards appear to be the compromise of professional autonomy and the unwelcome impacts upon professional identity. Wiliam (2009) notes that teachers should be able to exercise choice to 'find ideas that suit their personal style', having the flexibility to take others' ideas and contextualise them in their own scenario. The ETF (2014:1-2) standards open with a clear statement on the desirability of autonomy, stating that each practitioner should develop their own judgement of 'what works and does not work'. Standards 1

and 2 continue the theme of autonomy, setting expectations that practitioners 'reflect on what works best' in teaching and learning' and 'evaluate and challenge' practice, values and beliefs.

This review has already highlighted that evaluations of practice should be part of a reflective audit, informed by collaboration with trusted peers, yet FE teachers may not hold the status required to exercise such autonomy. Sachs (2003:184) notes that we need to find a way to accommodate the 'ambiguities and uncertainties of alternative forms of education provision and policies', while simultaneously giving teachers 'clear guidelines as to what constitutes best practice'. It may be doubtful whether many teachers would disagree with this accommodation, but its final words are highly contentious and key to current teacher CPD programmes, the need to capture, codify and cascade 'best practice'.

The third argument made by Sachs, perhaps most relevant to this thesis, is around the value of standards as a driver and a map for CPD activity. She agrees (2003:182) that standards which are profession-defined provide 'direction and milestones… over the long term of a career' giving an enabling 'infrastructure' for professional learning. She contends, however, that standards are notoriously difficult for the teaching profession to keep control over. Measurement against standards can become politicised having implications on recognition and reward and 'any failure to acknowledge this is naïve'. Sachs holds (ibid:182) that strategies controlling teachers' work develop as a response to those teachers' independent actions, so 'teachers are not the mere recipients of policy'. Teachers have 'strong work cultures and considerable loyalty and dedication' which they can draw upon as a source of strength but which also 'renders them vulnerable to exploitation'.

The discussion of the impacts of standards on culture is advanced by Day et al (2005: 564) who note that tensions occur which leave teachers unsure of the 'extent to which they are able to use their discretionary judgements'. Teachers struggle to meet the 'responsibilities associated with their new performative identities' due to the challenges these onuses make to 'traditional' perceptions of professionalism. Sachs considers that teachers risk becoming 'complicit in their own exploitation and the intensification of their work' if standards-based CPD becomes an 'ideological tool' requiring educators to do additional work 'under the guise of increasing their professionalism' (2003:184). If professional standards become a tool enabling employers to demand more 'tick-box' CPD be undertaken, this burden may have counter-productive impacts upon teachers' ability to undertake meaningful, autonomous CPD beyond simplistic performativity-related learning.

Setting the Benchmark for FE: Standards in a State of Flux

In a sector which has such diverse provision, learner profiles and learning environments, any push for identification and use of singular, objective 'best practice' seems contradictory. Sennett (2009:52) speaks of the problems caused by 'conflicting measures of quality, one based on correctness, the other on practical experience' when absolute standards of quality cannot be reconciled with 'quality based on embedded practice'. There will likely be tensions if managers contend that there is one preferred way of facilitating successful learning which CPD can instil. Coffield (2009:372) considers the idea of a single, best practice solution to the diverse and complex problems of FE may be the initial step of 'the slide into authoritarianism'. He also notes that sector rhetoric is 'intensified [into] a concentration on excellence' quoting a DfE White Paper on FE 'which boasts: 'we will eliminate failure''. Coffield criticises such hyperbolic government rhetoric as operating 'like a ratchet screwdriver' which allows 'only constant forward progression' (2007:373).

It seems uncertain which quality benchmark FE teachers should be aiming for as vocabulary around performative targets is in considerable flux. Diachrony, or in this case, duality, in language use and meaning may be influenced by political factors (Saussure, 1916) and Coffield (2009:373) notes that

the ‘seemingly interchangeable’ terms ‘good’ and ‘best’ practice are problematic as they have not been satisfactorily defined, yet ‘somehow their meaning is considered…to be widely understood and agreed’. He quotes James and Biesta (2007:380) who conclude that the aim of standards is to move the sector ‘from a culture of improvement… to a culture of excellence’ via a ‘culture of compliance’. No mention is made that the culture of compliance was a logical, forced response by FE providers to a ‘plethora of policy initiatives’ from government, rather than a plan inculcated seeking excellence.

Coffield calls decrees to educators from Government ‘intemperate rhetoric’, critical of the imposition of any model of learning which remains ‘silent about what it means by learning’. Echoing Stenhouse (1976), his concern regards any political vision of quality which is a ‘narrowly conceived acquisition model’ where learning is thought of as ‘gaining possession over some commodity’. Coffield contends that learning is an ‘intensely complex’ set of processes yet observes that politicians view teacher CPD as a ‘simple matter of delivering packets of good practice’ to teachers who ‘digest them without difficulty’ and cascade them to colleagues who ‘absorb them with similar ease’ (2007:380).

Coffield (2007:387) notes that good practice must be created in each unique classroom setting so can ‘never be singular, fixed or absolute… handed down or imposed from above’. Importantly, the quality of teachers’ professional learning and reflexivity are not merely educational issues, but impact widely on the whole of society. Coffield (2007:388) asserts that a ‘vibrant democracy’ requires an ‘open-ended approach’ to educational best practice which remains within the control of ‘reflective learning professionals’ who must be well-resourced and who will be ‘sensitive’ to their specialist local contexts. He considers that the impetus for continuous improvement is political but will be unsuccessful without investment and stability as innovation must be ‘matched by continuity… professional autonomy and adequate funding’ (2007:388). Regarding policy formulated in a push for improved outcomes, the Government could be said to be ‘caught in the grip of a picture… while blind to the social conditions for its realization’ (Anderson, 2000:195).

Evidence of democratic, collegiate professional learning which engages with contextual complexity might be seen in the form of coaching or mentoring cultures in some organisations, but Kennedy (2005:10) holds that prevalent coaching-mentoring models of CPD tend to be skills- rather than values-focussed. The use of mentoring most often implies a hierarchical relationship ‘akin to an initiation’ to the ‘social and cultural norms’ of the institution (ibid:11). Kennedy’s concern is that only an ‘equitable relationship’ will allow teachers to ‘discuss possibilities, beliefs and hopes in a less hierarchically threatening manner’ concurring with Coffield’s (2007) call for the need for more democratic, autonomous CPD.

Though professional standards may drive professional learning in FE, these standards have become a moving target, dragging with them much mandatory CPD effort. It is held that familiarity breeds contempt, but the need to allow professional standards to bed in if they are to be used to measure quality and plan and chart CPD is well-documented (Sachs, 2003: Darling-Hammond, 1999). A need for stability to be present if standards are to be valuable for a profession gives us cause for concern given the ‘churn’ in FE standards and quality frameworks described in the opening chapter of this thesis. Wiliam (2009:2) notes that the current impetus for teachers’ development is ever-changing, focussed on ‘bureaucratic distractions’.

It will be useful to examine the direction in which teachers’ professional learning is currently being steered, why and by whom as ‘national education policy is inevitably implemented at the local level’ and will be interpreted depending on the ‘political, cultural and ideological forces’ operating in local, situated practice (Gregson et al, 2015:110).

Sachs (2003:178) quotes Ingvarson who states that effective, standards driven CPD 'looks to the long term' focussing on 'teachers as persons, where they are and what they might become', not merely upon the present policy climate. Standards should be holistic, authored and owned by the sector and allowed to bed in through familiarity of use. Wiliam (2009:2012) suggests that this ideal is not realised in FE as organisations are 'inundated with initiatives' and struggle to embrace them all so 'when everything is a priority, nothing is'. He contends that restricted budgets force organisations to be selective in CPD investment, but rather than ensuring that CPD embeds standardised practice, we must give teachers time to focus on how to 'do even better things.' When considering where teachers' CPD efforts and the development emphasis for FE students should be focussed, an obvious interpretation of the ETF (2014) Professional Standards suggests the focus should be a dual one, embracing development of specialist vocational knowledge and of transferable skills.

FE CPD: Following Standards in a Skills and Innovation Focus

Moving to a specific exploration of ETF's 'aspirational standards' for FE practitioners (ETF 2017a), many of the twenty standards appear to meet Sennett's (2009:250) benchmarks. The Standards employ accessible wording, avoiding abstract concepts. The (2014) Standards contain detail regarding classroom practice familiar to teachers as the bread and butter of practice, addressed in the curricula of initial teacher training. The requirements to 'Inspire, motivate and raise aspirations', 'promote positive learner behaviour', 'enable learners to share responsibility for their own learning' and 'apply appropriate and fair methods of assessment' are concrete and stated in plain language.

Such operationally-focussed statements account for 7 of the 20 ETF (2014) standards but there may be danger lurking in the accessible language due to the Standards' instrumentalist nature. Standards may be used by an organisation as a jigsaw whose completion is expected to result in a picture of model professionalism, but the architect seems likely to be the organisation and not the individual practitioner. At worst, professional standards may be used as a 'checklist' which treats educators rather like a car booked in for its MOT, determining by inspection which areas of practice have 'passed' and which require remedial action. The way in which standards are employed will depend on who is doing the testing and what end is in mind and Sennett (2008: 238) warns against any 'wish to simplify and rationalize skills' noting this is impossible as 'we are complex organisms'. He makes the argument that to work well, people must have 'freedom from means-ends relationships' if they are to appreciate the 'value of experience understood as a craft' (ibid: 288).

Sennett (2009:270) holds that the 'modern era is often described as a skills economy', defining skill as 'a trained practice'. Eraut (1996: 125) defines skill as an 'integrative overarching approach to professional action' but adds that skilled practice incorporates 'both routines and the decisions to use them'. Sennett echoes the ideas of Schön on 'reflection in action' commenting that the craftsman 'is judging while doing' (2008:296) while Schön (1983:68) describes an expert as a 'researcher in the practice context', not dependent on established theory and technique, but one who 'constructs a new theory' for each 'unique case'. If skills are to be developed, Sennett speaks of the requirement for 'constant interplay between tacit knowledge and self-conscious awareness' the former being the 'anchor', the latter its 'critique and corrective' (2009:50). He contends that higher level craft quality only emerges once practitioners have time and a stable professional environment allowing them to make judgments on unspoken 'habits and suppositions'. Importantly, Sennett (2009:50) notes that 'churning reform, doesn't allow the tacit anchor to develop, then the motor of judgment stalls'.

The aspiration for development of knowledge- and experience-rooted higher-level skills is present in ETF Standards 7, 8 and 9 which require FE practitioners to maintain and update their knowledge of 'subject and/or vocational area' and 'educational research' and to be able to 'apply theoretical

understanding of effective practice' by 'drawing on research and other evidence' (2014:2). These are significant undertakings requiring development of both a vocational skills base and evidence-based, pedagogical knowledge. The former is challenging, especially in vocational specialisms where innovation is constant, such as Information Technology, or where fast-changing trends shape industry development such as Hospitality or Beauty Therapy. The latter casts the teacher as action researcher able to locate, internalise and apply relevant theories to situated practice. To fully realise both requirements requires true, dual professionalism comprising significant industry sabbaticals consolidated through use of underpinning academic and practitioner research, yet achievement of these 2 standards is not where the focus of much mandatory CPD activity currently falls (ETF, 2018).

It is worth examining further the literature on the focus of the FE CPD agenda. This reveals significant emphasis on the themes of 'skills embedding' and the desirability of 'continuous innovation'. A significant focus is the requirement to develop the maths, English, digital and wider 'employability skills' which are 'embedded' into FE curricula. This can be evidenced in ETF (2014) standards 15 'promote the benefits of technology and support learners in its use', 16 'address the mathematics and English needs of learners' and 19 which requires vocational knowledge to be developed 'in collaboration with employers'. Beyond dual professionalism (CAVTL, 2013), FE teachers must now be jacks-of-all-trades, proficient in additional skills- and employability-related areas due to what O'Leary (2018:2) calls 'the inclusion of the thematic priorities of others'.

The requirement for students to 'deploy a portfolio of skills rather than nurture a single ability' in preparation for the workplace makes education's purpose 'bulldozing the career path' (Sennett, 2009:265). The curriculum's employability focus is criticised by Biesta (2005: 688) who dubs it 'learning for earning', contending that teachers now nurture minds largely to secure economic growth. Sennett considers that casting teachers as specialist multitaskers 'erodes belief that one is meant to do just one thing well' noting that in such a climate craftsmanship is 'particularly vulnerable' based as it is on 'slow learning and on habit' (2009:265). Sennett contends that the learning for employability philosophy sees 'superficiality… put to particular use… applied to the rapidly changing opportunities of the global economy'. He notes that a worker who excels in one aspect of craft discipline may be 'left behind in these febrile shifts' as instead of craft skills, employers value an ability to 'manage many problems at the expense of depth' to fit an economy which 'prizes quick study and superficial knowledge' (2009:284).

Innovation, Innovation, Innovation: a Neoliberal Call to Arms

The second prong of many CPD forks is the search for continuing innovation in practice which has close ties to the 'skills agenda'. The word innovation appears as a placeholder signifying currency or quality in many organisational mission statements and appears in the Standards in the shape of statement 4, 'be creative and innovative in selecting and adapting strategies'. This statement appears to either conflate innovation with creativity or views innovation as being naturally desirable in of itself.

FE practitioners may agree that classroom challenges need creative solutions, particularly in times of reduced funding, though Sennett (2009:290) claims that the word creativity should be viewed with caution, as it brings with it 'much Romantic baggage - the mystery of inspiration, the claims of genius'. The value of innovation as a magic bullet places focus on commercial or technological impetus rather than craft skills, suggesting that technology affords better solutions, meets new requirements or solves future challenges, which are possibly yet unknown. The call for innovation is often coupled with a suggestion that the application of technology will naturally provide superior learning solutions (FELTAG, 2014).

Hyland (2018: 15) offers an alternative perspective more in keeping with Sennett's views on craft and the commune. He notes that recent work in the philosophy of technology education references a 'transformative epistemology' regarding technology as an 'extension of human capability' but with the human aspect as key. He contends that expert use of technology and the artefacts it produces ultimately 'rests upon the social interactions that arise' during the development process. Regarding 'embodied learning' as having a crucial role, Hyland notes (ibid:16) that access to the 'extended mind' of connectivist knowledge located in digital systems is only accessible through physical operations 'in which minds and hands are inextricably conjoined'. Quoting the established chestnut that technology will place the world 'at our fingertips', he reminds us that fingertips 'are connected to hands manipulated by bodies and minds' (ibid: 16).

Sennett concurs and references the introduction of Computer Aided Design (CAD) systems to refute any notions of technological supremacy (2009:44). CAD's innovation certainly brought savings in time and labour, but architects reported that ease came at the expense of collaborative work and truly knowing site terrain, a knowledge only possible through a team approach using visits and repeated drawing. CAD brought revolutionary ways of rendering designs, but, following significant errors in realised designs, for example building orientation with respect to daylight or footfall, many architects returned to the use of original sketches from site visits as 'when the head and the hand are separate, it is the head that suffers' (ibid:44).

Sennett also (2009:230) takes issue with an unquestioning approach to the desirability of innovation, asking for craft challenges to be addressed through repair as 'by fixing things… we often get to understand how they work' (ibid:200). He contends that the application of patience and persistence is the correct way for professionals to 'deal with difficult and ambiguous problems', to find the 'most forgiving element in a difficult situation' (ibid:221). Rather than moving on to trial a new solution or seek an answer for imagined, future problems we should be present with our current challenges and 'visualize what is difficult'. Sennett encourages craft building 'on the live edge' (2008:213) through patient repetition, noting that paradoxically, revolutionary ideas come from evolutionary steps. Intuition 'can be crafted' to allow 'imaginative leaps' which may guide us towards an 'unknown reality latent with possibility'.

Coffield and Edwards (2009:388) are equally critical of any unquestioning impetus to innovate. They blame pressure to find revolutionary educational approaches on 'political emphasis on momentum' which conflates 'improved performance and innovation'. Instead of innovation for its own sake the FE sector requires 'continuity for institutions, stability for students, professional autonomy and adequate funding.' Coffield (2017) calls for 'improvised planned change' in which 'management stop prescribing or controlling teachers' efforts at change' and instead nurture 'improvisations that flow from new ideas' (2017:41).

The primacy of importance given to innovation may come as a result of curriculum being steered to serve neo-liberal human capital theory. Biesta (2017) raises a concern that education's purpose is now to serve the economy, building employability skills to fuel productivity. This focus may also have a negative global impact in damage to the environment and Biesta contends that environmental degradation endangers a core purpose of education, 'the welfare of all' (2015:81).

Making Room for Core Values and Identity

Scales (2012:2) calls for 'values-driven, pragmatic' teacher CPD rather than means-end compromises fitted to suit an ever-shifting, innovation-focussed landscape. He asserts that educators must not be 'subverted into merely training staff to meet the demands of the latest big idea' and quotes Coffield (2008) in calling for us to 'put teaching and learning at the heart of what we do' rather than reacting

to ‘government or management caprice’. Coffield (2015) adds that tutors should dedicate themselves to ‘acquiring the habit of democracy… acting in accordance with our democratic history, values and practices’.

Adoption of a ‘banking concept of education’ (Freire, 1968:72) regards students, trainee teachers and teacher-learners as ‘containers’ to be ‘filled’ with knowledge. Freire warns us against regarding education as transmission, contending that knowledge emerges through ‘invention and re-invention’, through ‘restless, impatient, continuing, hopeful inquiry’ in which learners are empowered to ‘critically consider reality’ (ibid:72). Educators should regard learners not as ‘docile listeners’ but as ‘critical co-investigators’ whom teachers engage in ‘problem-posing’ dialogues (ibid:79) enabling learners to view their reality as ‘in process, in transformation’ (ibid:81).

Heidt calls upon Humboldt’s thinking in holding that neoliberal education opposes the central notions of *Bildung* by ‘promoting control and heteronomy’ (2015:10). *Bildung* has been subverted, used as a ‘servant to sustain… future viability, economic competitiveness’ rather than working towards its original aims of ensuring social prosperity (ibid:8). She holds that education now requires learners to ‘acquire a managerial mindset’ so that the ‘focus on the self’ is now given ‘an external and economic purpose (ibid:9). Drawing (2015:4) on the original understanding of *Bildung,* Heidt insists that teachers require autonomy to ensure that ‘research and teaching serve humanity… not economic utility’. She calls for individual teachers to have power to act ‘not simply as an agent or an instrument’ but as an ‘autonomous individual attempting to develop an inner self’ (ibid:4).

Kennedy (2005:9) posits that increased standardisation encourages CPD to focus on quality assurance and accountability, also fixing education’s purpose on ‘improved economic status’ for the individual and focussing societally on ability to ‘complete in the global economy’ (ibid:9). She instead calls upon teachers to attend to ‘central and contentious’ questions on the purpose of teaching not addressed by professional standards contending that CPD must be ‘infused’ with ‘critical scrutiny about social purposes… moral directions’(2005: 9).

Concepts of moral purpose and Social Purpose Education are closely tied, and the latter calls for teachers to be activists as well as educators, a concept unaddressed in the Standards. Johnston describes Social Purpose Education as possessing ‘moral charge’, having clear emphasis on ‘egalitarian and humanistic values’, involving a commitment to democratic education but also engaging in ‘dissent’ against lack of democracy (Johnston, 2008:1). A core function of the social purpose educator’s role is development of ‘critical and active learning for citizenship’ (ibid:5) requiring teachers to ‘maintain personal and political integrity’ (2008:2). The importance of bringing personal values and ethics to inform classroom actions is hinted at in ETF (2014) standard 2 ‘evaluate and challenge your practice, values and beliefs’. If, however, an educator performs an ethical audit and finds her values and beliefs to be contrary to other ETF standards and to educational policy, perhaps those standards will mirror Douglas Adams’ description of dichotomy and promptly disappear ‘in a puff of logic’? (1979:6:23).

Teachers CPD: Summing Up the Contradictions

This consideration of educators’ CPD direction against the backdrop of the Standards closes by addressing an omission thus far as ETF standard 12 remains unaddressed. It requires educators to ‘understand the teaching and professional role and responsibilities’. This review has seen the educator cast as one who must use CPD to develop as expert pedagogue, researcher, vocational specialist, teacher of maths, English, digital and employability skills, motivator, innovator, philosopher, reflector, champion of equality and inclusion and collaborator with peers, managers

and employers. This extensive, unwieldy list seems likely to grow. Coffield (2017:41) points out that FE managers are 'prescribing or controlling teachers' efforts at change' not to improve quality but 'to comply with a stream of internal and external policy changes' said to be part of their professional responsibilities', while 'not necessarily related to improving learning'.

Answering the question posed at the outset of this chapter '*what is CPD*?' for teachers seems rather like opening a thesaurus and reading a word's definition and, below it, its antonym, so polarised are the views of what CPD is and how it should be undertaken. This should not be unexpected as education may only mirror an increasingly two-tier society riven with political and ideological divisions, one in which individuals and groups find it difficult to reach common ground. Numerous authors propose a model of CPD which is patient, persistent, holistic, reflective, autonomous, personalised, situated and collaborative. Opposing them appears to be a political climate which prizes innovation and performativity wherein learning for educators and students should be a corporate-mandated, instrumentalist, means-end activity focussed on achieving consistency of performance, generic enough to achieve economies of scale and directed to economic imperatives.

Coffield (2015) and Scales (2012:2) note that FE teachers are 'having things done to them' rather than with them and instead managers should create an ethos which 'values and encourages' CPD and 'trusts teachers to undertake it'. Golding, Brown and Foley (2009:47) note that the prevalent model of formal learning programmes is 'akin to large-scale food production where there is an emphasis on commercialism, standard labelling and accreditation, processing, quality assurance and packaging'. Producers of 'both food and learning… are particularly concerned with efficiency, economies of scale, throughput and consumer satisfaction' developing a 'well-marketed product' with 'brands' recognised by institutions and government stakeholders.

A quality assurance focussed style of CPD adopts Kennedy's 'transmission view' of professional development. Teachers are 'initiated into the status quo by more experienced colleagues' or by outside experts as part of 'event-based' CPD (2005: 11). Employment of a deficit model is a signature of transmission methods which employ training, award-bearing, cascade and standards-based strategies and use hierarchical mentoring arrangements to promote uniformity and accountability. Scales (2012:2) feels that if teachers' CPD is mandated thus by 'management diktat' then 'there will be, at best, grudging compliance'. Low participation rates for teachers' CPD could evidence the tailing away of 'grudging compliance'. Teachers may be rejecting the prevalent agenda, seeing the autonomy hinted at in the ETF (2014) Standards as 'false charity' (Freire, 2005:45) if CPD is not allowed to be authentically heutagogical.

Towards Transformative CPD

A philosophical pivot point occurs when teachers' professional learning is underpinned by heutagogical principles. CPD can be undertaken as part of an equitable relationship which values open exploration of problems and embraces discussions of identity and values alongside pragmatic concerns. Kennedy holds (ibid:12) that only when CPD is rooted in a culture which promotes peer-to-peer relationships providing a 'supportive but challenging forum' and accommodating 'both intellectual and affective interrogation of practice' will 'transformative' CPD occur.

Key to whether CPD is transformative, Kennedy contends, (2005:16) is the nature of the influences and expectations at play when setting its agenda. She suggests (ibid: 16) we ask whether CPD is part of an accountability process, whether it has the ability to support increased professional autonomy and whether its fundamental purpose is to enable teachers to 'act as shapers, promoters, and well-informed critics' of educational reforms. Sennett finds favour with a transformative approach

contending that we should return to 'vigorous cultural materialism' in which we are more critical of current power structures and the ideologies behind them (Gregson et al, 2015: 144). This critique requires teachers to examine the ethos behind CPD activities and, more broadly, to interrogate the philosophical underpinning of professional standards. Educators need to critique the context and political implications of their learning and identify possibilities for rebuttal or, at least, subversion.

Though some educators now report that they no longer participate in CPD, there is a possibility that teachers are not withdrawing from professional learning but are subverting the prevalent instrumentalist CPD agenda, replacing it with one of their own, realised in informal communities of practice and through alternative dialogues. Having examined the formal CPD agenda in FE, it is valuable to explore the possibilities afforded by informal professional learning to establish whether less formal CPD activities display the ethos or attributes of Kennedy's (2005) 'transformative' professional learning.

Informal Learning: Unrecognised Below the Waterline

An exploration of the nature, process and outcomes of informal professional learning is fundamental to this thesis, centred as the work is on teachers' participation in informal CPD using social media platforms. A fruitful place to begin is to interrogate what is meant by the terms 'formal' and 'informal' in relation to FE educators' CPD.

Kennedy (2005: 3) acknowledges Eraut's (1994) three 'major contexts in which professional knowledge is acquired', 'the academic context', instances of 'institutional discussion of policy and practice' and 'the practice context'. The first two of these situate teachers' CPD in teacher training scenarios or performative organisational dialogues, as 'formal' or 'institutionally mandated' learning.

Czerniawski (2018:19) elaborates on Eraut's (1994) 'practice context', dividing teachers' learning into two 'paths' which he terms 'formalised programmes' and 'self-guided' learning. The latter is described as 'continuous experiential learning', informal development opportunities situated in and arising naturally from 'everyday professional practice'. Czerniawski (2018:20) notes that self-guided learning opportunities occur when individuals 'mutually engage in activity and develop communal resources', learning by 'participating in practices… in a social, cultural context.' Calling the position that formal knowledge acquisition leads to more effective teaching 'an assumption', Czerniawski (ibid:21) holds that the importance of informal learning 'cannot and should not be underestimated.' Kennedy (2005:4) concurs that 'informal professional discussion and reading that takes place outwith the institutional context' are 'surely relevant' as professional knowledge acquisition scenarios.

Regarding the practical reality of informal learning, Greatbatch and Tate (2018:13) report that 'collaborative forms' of informal CPD are 'most valued' by FE teachers, specifically noting the importance of informal peer observations, networking events, coaching, mentoring and action research. They hold (ibid:46-47) that the most effective professional learning is 'based on learning from others' leveraging shared resources, peer support and working together using 'the informal help available' to 'refine specific teaching skills'. The scope of 'learning beyond the classroom' for vocational teachers is wide, extending into the subject-specialist workplace. Ingle and Duckworth (2013:60-67) highlight the value of wider work-based informal CPD opportunities encompassing workplace visits, industry sabbaticals, employer mentoring and job shadowing as well as the use of social media platforms and communities, the concern of this thesis.

Coffield (2000:1) summarises learning in/formality by holding that if learning were represented by an iceberg, the section above the surface 'would be sufficient to cover formal learning, but the submerged two thirds… convey the much greater importance of informal learning'. Rogers (2014:22) also employs an 'iceberg model', contending that while adult learning should be 'intentional', we often acknowledge only visible, formal learning. Rogers also notes (ibid:22) that 'much learning is unconscious' speaking of the 'invisible reality of informal learning'. Coffield (2000:8) further holds that informal learning should not be regarded as a formal precursor or 'an inferior form of learning' but as 'fundamental, necessary and valuable in its own right'.

Eraut (2000) notes that the umbrella term 'informal' itself is unhelpful, implying a lack of structure or absence of purpose, offering an alternative 'non-formal learning'. McGivney (1999:1-2) describes such learning as taking place outside a dedicated, course-based environment, arising from expressed interests and needs of individuals and groups and being delivered in flexible ways. McGivney's (1999) definition is interesting as this literature review has discussed the power of needs-based agency and the value of craft communities as desirable factors in professional learning (Poylani 1967: Sennett, 2009). It appears significant, given the reported low CPD participation rates in FE (ETF, 2017), that McGivney further concludes that informal learning may go unrecognised by participants and the organisations they work in. Eraut (2004: 249) concurs, stating that informal learning is 'largely invisible… taken for granted or not recognized' noting that participants can 'lack awareness of their own learning'.

Eraut also notes (2004: 248) that research into outcomes of informal learning 'is very limited' while Jeffs and Smith (1990:22) call informal learning 'a vibrant and… undervalued form of practice'. Coffield (2000: 1) holds that when authoring standards, setting policy and conducting reviews in FE, focus remains on formal provision and contests that the value of informal learning is largely ignored. The informal educators' networks investigated in this thesis fall into the category of informal professional learning deemed worthy of further exploration.

Jeffs and Smith (1990:4) call setting- and curriculum-based definitions of learning formality 'unhelpful and suspect' as by giving too much importance to setting we 'miss… the significance of pedagogy also of the practitioner.' Eraut (2000: 12) cautions against assuming the existence of formal-informal duality, instead considering informal learning as a spectrum of activities which evolve into semi-formal or even formal frameworks. His spectrum of informal learning (2000: 12-13), is based upon intention; implicit learning, 'acquisition of knowledge independently of conscious attempts to learn' with 'absence of explicit knowledge about what was learned' is found at one extreme and 'deliberative learning' whereby specific time is devoted to learning is found at the other. Between these poles is 'reactive' learning, explicit, spontaneous and prompted by unfolding events and natural opportunities. Jeffs and Smith (1990: 5) concur, urging us to 'think anew' of learning communities which 'utilize a variety of educational resources, formal and informal, including the skills and talents of people'.

A need to consider a spectrum of informal learning invites consideration of Jeffs and Smith's (1990:6-12) flexible, 7 characteristic model. It frames informal learning in terms of its setting (non-prescribed), its action (purposeful and conscious; learning may be incidental but is not accidental), its timescale (highly variable), its initiation (through stimulus or circumstance), its locus of control (negotiated through participants' agency), its critical, dialogic nature, its value-laden identity (respectful, democratic, socially inclusive) and its pedagogical pattern which is flexible, embracing experiential and didactic styles.

Jeffs and Smith's (1990) model is supported by Lave and Wenger's (1991) work on participative, 'situated learning' in 'communities of practice'. Wenger (1998:3) cautions against regarding learning

as an individual pursuit with a 'beginning and an end… separated from the rest of our activities… the result of teaching'. Wenger situates learning in participative, social situations which go beyond local events with fixed participant groupings and encompass social communities, involving the construction of 'identities in relation to these communities' (Wenger, 1999: 4). This experiential, participatory activity, rooted in the social experience of daily life is described by Wenger (ibid:5) as 'ubiquitous', 'ongoing' and importantly 'often unrecognized'.

Creation of Learning Communities

Dewey (1956:14) notes that education is a social process whose aim is a democratic one. Communities are people 'held together because they are working along common lines, in a common spirit, and with reference to common aims' so all might have equality of opportunity. Wenger (2007, in Smith, 2009:1) notes that learning communities form when people engage in collective learning in a 'shared domain of human endeavour: a tribe learning to survive… seeking new forms of expression… working on similar problems… defining their identity… helping each other cope'. Key is a commonality of purpose. Community participants 'share a concern or a passion' for something they do and 'learn how to do it better as they interact'. Wenger, like Sennett (2009) holds that collective learning reflects 'both the pursuit of our enterprises and the attendant social relations'. The practice built as a result of communal effort is the 'property' of a community, created by 'sustained pursuit of a shared enterprise.' Wenger (2007, in Smith, 2009:1) contends that communities of practice are set apart from other groups by provision of mutual assistance resources including 'experience, stories, tools' and 'ways of addressing recurring problems'. Knowledge is located within the community itself.

Though learning in community has much in common with Kennedy's notion of transformative CPD (2005: 13), she adds a caveat regarding the efficacy of communities of practice. Concurring with Wenger that learning communities can be 'powerful sites of transformation' where individual knowledge is 'enhanced significantly', she adds that managerial accountability or performance management agendas must play no part in influencing community purpose if transformative learning is to occur. Central to community success are issues of power and agency. Wenger (1998) concurs that community members must exert 'a level of control over the agenda' and Kennedy adds that in less favourable circumstances, communities of practice may 'serve to perpetuate dominant discourses in an uncritical manner'. Tennant (1997: 79) agrees noting that some communities may have an insufficient underpinning of knowledge or skills, while others may exhibit 'power relationships that seriously inhibit entry and participation'.

Learning Communities in the Digital Domain

Knowles (1950, in Smith, 2009) holds that informal communities of practice may become 'laboratories of democracy' where 'attitudes and opinions' are formed. Kjærgaard and Sorensen contend that it will be important for teachers to move such communities into the 'digital habitat' where learning becomes a social act based on information sharing and note that this is how many contemporary learners prefer to learn. They posit (2014:221) that educators need to 'take social constructivism into the digital age' but caution that much teacher training and CPD fails to provide 'robust methodologies' for teachers to gain 'network literacy' and develop 'authentic pedagogic designs' in the digital domain.

Digital professional learning may also bring benefits of flexibility for busy professionals. Leadbetter (2000:112) holds that informal learning can best be done 'at home, in offices and kitchens, in the contexts where knowledge is deployed to solve problems and add value to people's lives'. Such

informal, online communities have been referred to as rhizomatic networks, particularly when they operate outside conventional organisational spaces, hierarchies and constraints. The rhizomatic analogy suggests a community dialogue which has 'neither a beginning or end, but always a middle from which it grows and overspills… multiple entranceways and exits, and its own lines of flight' (Deleuze & Guattari, 1987:21).

How Was It for You? Assessing the Impact of Teachers' CPD

Wherever professional learning may fall on the formal-informal spectrum, there appear no set solutions to its design and facilitation. Measures of CPD effectiveness, then, should be equally sophisticated. CPD impact evaluations should go beyond simple, statistical measures such as raised learner achievement and holistic, qualitative data should be afforded importance. Whitehouse (2011) holds that judging CPD effectiveness calls for subtle, complex analysis, measured by changes in teachers' subject and pedagogical knowledge, their self-efficacy, the types and frequency of behaviours they exhibit and the teaching and learning activities they employ.

Gregson et al's (2007:6) suggested evaluation employs 'formative evaluation' leading to 'illuminative evaluation', performed over an extended period using triangulated, mixed methods. Model teacher CPD evaluation asks managers, teachers and parents (in this school-based study) about impacts attributed exclusively to areas covered by interventions. Findings are used in an iterative process of research and consultation, a 'Report and Respond Survey' (ibid: 76) allowing stakeholders to comment upon impact analyses. Inquiry and feedback can thus combine to give confidence in findings. This patient, holistic evaluation concludes with qualitative impact descriptors; teachers are able to be 'more confident', 'more innovative', 'develop positive professional relationships and high levels of social capital'. A further benefit of this type of evaluation was that subjects built 'accessible professional relationships' and developed 'high levels of trust' in the consultants working with them to evaluate their progress (ibid:29). Sennett (2009:249) concurs with such patient relationship-building, holding that community is not created by expertise in a 'self-conscious or ideological sense', instead we should 'focus on whole human beings in time'.

The battle between holistic judgements, taking along subjects in a qualitative, patient process and the imposition of rigid, performative, outcomes-focussed measures appears to be being won by the latter approach in education. Both DfE (2016) and Ofsted (2014) CPD standards call upon opinions and involvement of external 'experts' assuming an outsider's perspective will inherently be an informed, valid, impartial arbiter of quality; both also place an explicit focus on immediate improvement of learner outcomes as a benchmark for success.

If tensions appear when considering impact assessments of formal CPD, then the question of how success of informal community learning might be evaluated, given FE's performative climate, is more complex and key to this thesis. Criticality is needed. A critical stance will be required when establishing the extent and the scope of professional learning reported by participants in informal online communities and determining whether this learning might fall under Kennedy's (2005) definition of 'transformational' development.

Grundy (in Jeffs and Smith, 1990:22) states that an evaluation of informal learning should be 'integral and not a separate part of the whole educative process'; there is a need to assess 'how closely the product matches the objectives'. Grundy (1987: 77) echoes the thoughts of Dewey (1956:1961) in holding that evaluation involves a judgement of the extent to which the 'learning experience furthered the "good" of all participants'. Focus should fall upon 'the process, how people experience it' (Jeffs and Smith, 1990:22). Informal learning evaluations require the 'construction of

rather different criteria or indicators of success' from formal learning. Key is 'the nature of the dialogue that occurred… the extent to which the discourse was critical'(ibid:22).

Signs of Chaotic Times: Agency, Capital and Doxic Emergence

The review of formal and less informal CPD undertaken in this chapter reveals significant fault lines between the professional learning agenda promoted for educators by the Government and the ideals of professional learning advanced in literature. The former suggests a transmission model to build standardised competences enabling teachers to deliver a skills' and employability-focussed curriculum. The latter promotes a critical, transformative model founded on teacher agency, acknowledging professional identity and values as having equal status to knowledge and skills. Disconnects in agenda and power imbalances between those mandating, funding and overseeing CPD and evaluating practitioners' performance as a result of it suggests it is valuable to close this literature review with a consideration of Bourdieu's (1984:1986) ideas on habitus, cultural capital and doxa. These are significant themes which will be returned to throughout this thesis.

Habitus, an individual's 'dispositions, or trained capacities and structured propensities to think, feel and act' is created through socialised norms, dependent on assets such as level of education and accumulation of cultural knowledge (Navarro 2006: 16). Cultural capital (Bourdieu, 1984:1986), the behaviours, knowledge and skills that an individual draws upon to demonstrate competence, and therefore social status, in its embodied, objectified and institutionalised forms might present in the field of education in a teacher's accent or dress, through the books on her office shelves and by her qualifications or membership of professional bodies respectively. Cultural capital is considered by Bourdieu as instrumental in determining an individual's social and professional mobility.

Opportunities for belonging, and therefore for progression in a field, can be influenced by leveraging shared cultural capital, by conforming to group identity (Bourdieu, 1986). Conversely, standing and mobility can be restricted not only by social differences and hierarchies, but also by an individual's self-limiting perceptions and behaviours, their self-concept in terms of knowing their place.

Deer (in Grenfell, 2008:115), defines doxa as the 'shared but unquestioned opinions and perceptions' of agents in a field, distinct from explicit, openly-voiced opinions which are open to discussion and able to be contested. Deer (ibid:115) describes doxa as 'intimately linked to field and habitus' quoting Bourdieu in stating that doxa may be arbitrary in nature, and as a 'set of fundamental beliefs', it does not need to be asserted in an 'explicit, self-conscious dogma'. If informal professional learning has an agenda in contradiction to that of government and leaders in FE, a doxic disconnect will likely be seen between FE educators and those setting, funding and overseeing the curriculum. The power of doxa lies in the fact that what goes unsaid can be accepted by a group as self-evident, as common sense. As Bourdieu notes 'what is essential goes without saying because it comes without saying' as 'tradition is silent, not least about itself as a tradition' (1977:167). Deer notes that doxa can be self-reinforcing (in Grenfell, 2008:116) embedding 'socially arbitrary' power relations and allowing values to be reproduced, strengthened and legitimised.

Bourdieu holds that doxa can lead groups to forget causes of inequality in society and adhere to 'relations of order... accepted as self-evident', but also contends that doxa can be empowering (1984: 471). Moore (in Grenfell, 2008:106) explains Bourdieu's stance on 'consecration' stating that we 'classify ourselves through the ways in which we classify the world, but the world has already classified us'; we may, or may not, confirm or 'consecrate' the act of classification. We may subvert or reject the classification the world places upon us. Deer (in Grenfell, 2008:117) notes that doxa requires that 'those subjected to it do not question its legitimacy or the legitimacy of those who

exert it'. Research should work to reveal any 'doxic conflation' of 'misrecognised symbolic power' which underpins practice in a field. If informal learning dialogues within a field such as education question doxic legitimacy and refute 'rubber-stamping' of a prevalent instrumentalist, performative agenda, then communities of practice engaging in alternative dialogues may be working to create their own reframed doxa.

Deer (in Grenfell, 2008:118) notes that Bourdieu contended that, however difficult, it is possible that a doxic 'universe of the undiscussed' might be overhauled in 'times of crisis when drastic socio-cultural modifications and disruptions… give rise to critical consciousness'. Coffield (2018) notes that significant upheaval is now evidenced in the UK caused not only by substantial internal political shifts, such as the impacts of austerity and Brexit, but also by extra-national concerns such as climate change. We could find ourselves in a time of crisis (or crises) sufficient to exacerbate, even empower doxic overhaul. Emergent, informal educators' networks facilitated on online platforms could be able to leverage strong discursive means and social capital, building vocal communities of practice with their own reframed doxa.

Emergent, shared perceptions may be 'mediated by the ruling doxa', but Deer (in Grenfell, 2008:119) posits that heterodoxic beliefs are more likely to emerge from groups high in cultural capital, which teachers may be said to be in their field. In informal online communities of practice, we should look for the emergence of a 'field-specific' set of beliefs, FE teachers' becoming 'autonomous and differentiated' with their own 'normative pre-suppositions and pre-dispositions', their own doxa (ibid:120). Online dialogues originally intended for pragmatic professional learning could develop to question the 'tacit rules of the game' provided FE teachers possess the required cultural capital.

A Teacher's Place is in the Political Field

Bourdieu (in Grenfell, 2008:121) contests de-professionalisation in any sector, contending that the knowledge level required for entry into a specific field should be 'maintained, and even raised'. The argument for a developed, broad professional knowledge base is perhaps especially relevant in education. Bourdieu holds that scholars have an explicit 'duty to enter the political field', to denounce the 'arbitrariness of doxa' and in doing so facilitate 'collective mobilization and subversive action' against established order. It will be important, however, for agents of emerging doxa to recognise their own assumptions and beliefs (ibid:125) when assuming the validity or supremacy of any new doxa, lest history simply repeat itself.

Bourdieu (1984:170) contends that 'the specific role of the sociology of education', and therefore of the researcher in education, is to study 'relations between cultural reproduction and social reproduction'. Researchers should attempt to determine how the education system contributes to 'reproduction of the structure of power relationships' and the reinforcement of structures which distribute cultural capital.

Priestley and Biesta (2015:5-6) encourage us to move beyond the narrow 'property' definition of an individual refining their practice through CPD to 'fit policy agendas' and instead adopt a broader 'ecological conceptualisation' of agency. We can view agency an 'emergent phenomenon… dependent upon the quality and nature of individuals' engagement with their environments'. They contend (2015:10) that achievement of agency is 'temporal… always orientated towards the future' considering short- and long-term term objectives and values, but 'enacted in a concrete situation', constrained by 'cultural, structural and material resources'. Agency is 'motivational' drawing upon the 'intention to bring about a future that is different from the present and the past' and possesses a clear moral purpose as 'trajectories' are 'creatively reconfigured in relation to actors' hopes, fears,

and desires for the future'. An essential element of agency is discourse, it is 'always a dialogical process' through which actors 'engage with others within… contexts of action' (ibid:7).

Achievement of increased agency is not without challenges and Priestley and Biesta (2015:18) contend that a key issue is the 'availability of resources', in particular 'relational resources' available in networks in which teachers are 'positioned socially'. Key to development of agency is the presence of 'strong informal relationships… high levels of trust' including 'horizontal… informal connections, often growing organically out of short-term needs' which help teachers to develop their practice. Agency is not solely about 'capacity-building', we should also examine the 'interplay' of what teachers bring to the situation and what the situation 'brings' to the teacher' (ibid:20). Neither is agency solely about forward-moving change; it may also be involved in 'reproduction of social patterns through active resistance' to policies which do not fit teachers' moral standpoints or core identity. Exercising agency involves far more than 'simply following unproblematic trajectories' when given opportunities for autonomy, as 'autonomy and agency are not the same thing' (ibid:20).

The predominant instrumentalist agenda in FE coincides with Sennett's (2008: 238) assertion that a dominant focus of the modern world falls on 'means-ends relationships'. Biesta (2005: 688) labels the UK's current educational policy 'learning for earning', contending that the dominant paradigm regards an educator's role as developing minds whose products secure the country's economic growth, viewing learning through the lens of human capital. Day et al (2005: 564) note that teachers struggle to meet the responsibilities of their 'new performative identities' due to ideological tensions between instrumentalist curricula and traditional notions of professionalism. Kennedy (2005:4) highlights tensions which occur during impositions of an educational agenda which fails to connect with teachers' 'essential moral purposes'.

If education is, as Bourdieu (1984) contends, the most important agency in formation of habitus, then the agenda at work when setting the schema for educators' initial training and the standards underpinning subsequent, career-long professional learning have potential to impact significantly upon habitus. Instrumentalist agendas and skills-focussed curricula may influence the dispositions of teachers and impact upon the focus they set for the development of their own learners and affect how they support and guide learners' affective development. Any impact on habitus and disposition assumes that educators accept and embrace the agendas which leaders impose upon them. Acceptance may depend not only upon the level to which teachers concur with the professional learning agenda set for them, how well it intersects with their professional identity, purpose and needs, but also on the degree of agency they possess and can leverage to disrupt or subvert an agenda with which they do not concur.

Summing Up the Literature Themes and Looking Ahead

This review of literature on professional learning and its relationship to professional standards has revealed that CPD should go beyond functional training, be timely, relevant and undertaken with agency. Professional learning should develop evidence-informed practice and contextualised, practical wisdom. CPD should be undertaken in community as part of a practitioner network working on shared interests and challenges. These are common benchmarks found across all sectors for CPD and are manifest in FE through the ETF (2014) Professional Standards. The Standards call upon teachers to develop evidence-informed pedagogy and vocational expertise, specifying required areas of focus, and to grow professional networks, specifically noting the importance of collaboration with quality improvement representatives and employers.

CPD further requires an examination of personal values and construction of professional identity

around those values. Value-laden choices on what kind of professional each individual seeks to be and identity-related questions around the core purpose of a craft impact upon CPD direction and choice. FE's Professional Standards (2014:2) ask teachers to challenge their 'practice, values and beliefs', but, at the same time, describe teachers as 'dual professionals… vocational specialists' (ibid:1). The Standards, again, are proposing that an employability and workplace skills development agenda is uppermost in teachers' minds when considering professional purpose, what should be valued.

Beyond individual identity, literature on informal learning tells us that consideration of shared community values and group identity is necessary. Informal learning communities form and coalesce around shared identity, each community possessing their own habitus and doxa. Learning agendas emerging through informal dialogues may coincide with or may challenge a profession's dominant doxa. Doxic challenge may enable, even drive, more democratic practitioner-led CPD agendas.

It is important to establish if, and how, teachers value informal community participation and whether they formally acknowledge it, considering what 'voice' emerges from informal communities. Equally, we must investigate if and how informal learning activities undertaken in community could be regarded as valuable by the sector stakeholders cited in the standards for FE. The next chapter of this thesis sets out the ontological underpinning and methodological basis for this investigation into FE educators' online informal learning dialogues.

Chapter Three: Methodology and Data Collection Methods

How We View Our Worlds

> *'ontological assumptions give rise to epistemological assumptions; these, in turn give rise to methodological considerations… informed by how we view our world(s), what we take understanding to be'.*
>
> Hitchcock & Hughes (1995) in Cohen, Manion and Morrison (2017:3)

The quote above sums up my process in this thesis and chimes with a significant theme. Worldview informs the focus of the discourses that an educator enters into, both formal and informal. Personal values and professional identity impact upon the areas that teachers prioritise for professional learning and how they undertake it, dictated by what they consider constitutes worthwhile, valuable knowledge and their preference for peer learning partners. Gregson and Hillier (2015:11) describe teaching from this identity-framed, value-laden perspective as 'not only an art and a craft' but a 'principled, moral practice, which can serve different purposes'.

All research activities adopt a paradigm, a way of researching phenomena, 'a view of what counts as… an accepted model' (Kuhn in Cohen, Manion & Morrison, 2017:8). This 'shared belief system' defines the identity of a research community and establishes its way of pursuing knowledge (ibid:8). Paradigms define what researchers 'are about' and 'what falls within and outside the limits of legitimate inquiry', but Guba and Lincoln (1994: 108 in Denzin & Lincoln, 2013) contend that such beliefs 'must be accepted simply on faith, however well argued' as there is 'no way to establish their ultimate truthfulness'.

The ontological standpoint taken by a researcher in response to the question 'what is the form and nature of the social world?' must be examined as this stance influences methodology, data collection and interpretation and therefore research outcomes (Coe et al, 2017:17). Opposing worldviews regarding the objective or constructed nature of reality have parallels with the tensions between formal and informal learning which are central to this thesis. It is equally important to explore personal epistemological perspectives, enquiring 'how can what is assumed to exist be known' (ibid:17). Epistemological standpoints, whether knowledge is gained directly from observation, or indirectly via interpretation of accounts again shows similarities with formal-informal professional learning duality.

Personal ontology, and therefore epistemology, may become embedded due to early life or educational experiences but may also undergo changes during lifelong learning. Significant social, educational and professional changes have had a clear bearing upon my ontological journey and demonstrate how early influences can significantly impact upon beliefs, and so on our 'habits' as researchers. Though an autoethnographic approach is not used extensively in this thesis, it will be employed in the early part of this chapter when examining changes to personal ontological and epistemological positions. Sparkes (2000, in Cohen, Manion & Morrison, 2017:289) holds that production of a 'politically and personally situated' narrative can be valuable when exploring issues of personal significance and it is my hope that use of an autoethnographic approach here may allow readers to feel the tensions and contradictions faced on my journey.

A Researcher's Journey from 'Proof of Facts' to Constructs

The daughter of a Black Country steel working engineer from a family in which generations worked in manufacturing, my education followed a similar route to family peers. I studied 'A' levels in Maths, Physics and Chemistry and embarked on a career in broadcast engineering. Exposure to a solely realist ontology led to belief in a single, external objective reality. Regarding epistemology, positivism dominated; knowledge was gained by empirical measurement, yielding generalisable results, expressed through universal laws (Crotty, 1998: Coe et al, 2017). Initial ontological and epistemological standpoints served me well in an engineering role. Ingrained beliefs were not shaken when I began an Open University degree in Computing a decade later; logical positivism and empiricism were unquestioned paradigms adopted by my tutors and expected from students.

In the final year of my degree, I studied '*IT and Society'*, an interdisciplinary module which analysed relationships between humans and technology. This gave me a new lens through which to view reality, introducing me to opposing ontological perspectives through study of technological determinist and social constructivist theories. Through the work of Bijker, Thomas and Pinch (1987), who hold that human action shapes technology, not the converse, I was challenged to consider that technology is embedded in a social context which frames and shapes it. Though examination of habitus (Bourdieu, 2007) would not follow until years later, a seed was planted in my consciousness; due to interpretative flexibility, artefacts have different meanings for different social groups.

As a keen, early adopter of technology, exposure to social constructivist theories caused discomfort to the point of 'ontological shock' (Tillich, 1963:113), introducing me to a worldview at odds with my own as an unquestioning consumer of technology. *IT and Society* was module among and all other degree modules reinforced a realist ontology, a positivist epistemology. Ironically, I dismissed constructivist and interpretivist perspectives as 'simply one point of view' but not my own in a search for cognitive consistency (Festinger, 1957). I now contend that there is a wider debate to be held on the narrow frame of ontological reference to which science students are exposed, but that is beyond the scope of this work.

I had always found academic work enjoyable, having had supportive peer groups with equally high motivations and ambitions. In the 4 years that followed gaining my degree a pivot point occurred as I moved from work-based training of broadcast engineers and producers to a lecturing role in FE, undertaking a PGCE then studying for a Master's Degree in Education. My worldview was challenged. Many of my Computing students had very different family and educational histories from my own and I was struck by how narrow my range of experience of education, and indeed, life, appeared.

The Master's course in Education was revelatory, requiring us to evaluate our beliefs critically, analysing opposing ontologies while working with challenging educators who all held strong interpretivist positions. Tutors cited Piaget, Gregory and Popper who contend that the human brain is 'not simply a blank slate on which the external world imposed itself' (Mingers 2006:15); perception and conceptualisation were 'active constructions' (Coe et al, 2017). This was my first substantive exposure to the interpretivist thinking that even the language we use to describe our observations is open to interpretation. The feeling of cognitive dissonance (Festinger, 1957) caused by what I have come to term the 'ontological whiplash' of the introduction to interpretivist thinking sometimes returns. Rather than experiencing a gestalt moment of ontological and epistemological reconciliation, the journey has rather been one of slower accommodation.

I moved first towards a post-positivist, transcendental realist position, accepting Bhaskar's (1998, in Collier, 1998) contention that the world might be divided into 'what is real' and 'what we might

know of the world'. Categorising the nature of the world as 'the real', 'the actual' (effects caused by the real whether observed, or not) and the 'empirical' (the range of phenomena which we, as humans, experience) seemed plausible. My ontological position was changing. The concept of 'the real' as composing material (the solar system, oceans, mountains), artefactual (the built environment, vehicles, computers) social (organisations, laws, class structures, social conventions) and ideal (language, ideals, beliefs, concepts, models) objects seemed a useful way to acknowledge the differences between physical objects and mental constructs. Agreement with Bhaskar's (in Collier, 1998:117) contention that reality is 'stratified' in an intricate hierarchy of structures, mechanisms and events appeared a useful way to acknowledge the complexity of existence. Bhaskar's call for us to be sceptical of the nature of reality beyond current epistemological reach, and that conflation of ontology with epistemology is an 'epistemic fallacy' appealed to me. It seemed logical that physical objects possess properties or powers regardless of whether or not we yet know about these aspects. In the field of scientific research, I accepted that the structure of the atom has remained the same over the past 2 centuries, while our concept and models of its structure have altered radically. Regarding scientific discovery, Bhaskar noted that 'though the natural… world does not change with the change of paradigm' discovery causes the scientist to work in 'a different social or cognitive world' (Bhaskar, 2011:10).

The most significant aspects of Bhaskar's work for me were his perspectives on critical realism as these allowed me to begin to reconcile positivism with new, interpretive perspectives. Bhaskar's position contends, importantly for my thought journey, that the physical and social worlds are fundamentally different in nature, so cannot be studied using similar methodologies. He holds (in Collier, 1998:117) that the social world may be studied, but that it is constantly reproduced, reinforced and transformed by human activity and that each social structure has its own 'peculiar mechanisms and emergent powers'. Embracing the ideas of a domain of transitive knowledge called to my newer, interpretivist thinking. Bhaskar (in Collier, 1998) holds that transitive knowledge, which relates to the discourses we engage in and the theories we formulate, is fallible. He urges us to investigate the causal mechanisms and processes behind events. Research, then, is a work in progress aiming to improve the concepts we use, attempting to gain a better understanding of reality rather than a mechanism for establishing nomothetic cause-effect certainty.

I now find some aspects of critical realist thinking problematic with respect to the social sciences' ability to gain 'understanding of reality'. Mingers (2006) has criticised Bhaskar's work, contending that social structures cannot exist outside participating agents' interpretations, therefore social science knowledge must be a constructed, social product. This means that any hypotheses made about causal mechanisms will be 'self-referential' (Mingers 2006:26), something I would have previously understood well as a computer scientist as involving use of a 'recursive loop', of logic which draws on its own previous results. When looking ahead to methodological matters, then, I need to be mindful of Gidden's (1976, in Cohen, Manion & Morrison, 2017:51) contention that all attempts to interpret the social world are problematic as they involve a 'double hermeneutic' requiring us to 'strive to interpret and operate in an already interpreted world' where 'meaning is paramount'.

My epistemological position has now shifted to concur with that of Habermas (1984, in Cohen, Manion & Morrison, 2017:52); when researching social phenomena, facts cannot be stated or observations made which are independent of the actors involved. We must be mindful that each actor involved in research work will have constructed a unique reality which will be 'mind-dependent' as we 'cannot see the world outside of our place in it' (Coe et al, 2017:18). When interacting with subjects we must be aware that we can only attempt to gain an interpreted, distilled, impression of their reality. I hold that researchers must be aware that observations can be fallible; all theory should be open to revision as we cannot be certain about the nature of social

reality (Habermas, in Cohen, Manion & Morrison, 2017). Regarding the relationship between humans and our environment, my position has moved from the deterministic one encouraged by my scientific background, to a voluntarist view that humans are 'initiators' who can determine 'their own actions with freewill and creativity, producing their own environments' (Burrell and Morgan, 1979, in Cohen, Manion & Morrison, 2017:5), exercising agency if given freedom to do so.
I have travelled a considerable distance from positivist academic roots and now acknowledge that interpretivist thinking is essential for educational research. I hold that my work as a researcher is 'not a matter of eliminating conflicting… interpretations' but should instead seek to 'distil… a more informed… consensus' (Coe et al, 2017:18). Consensus can only be elicited by interactions where different interpretations are 'compared and contrasted' to seek meaning through 'dialectical interchange', by considering opposing ideas and opinions (ibid:18). I also agree with Hammersley (2012:23); during practitioner research programmes such as the one which instigated this thesis, a partnership forms between researcher and researched which has 'a focus on the improvement of professional practice'. Educational research 'must be itself educative in character', aimed at 'realising educational ideals… or outcomes' rather than 'simply producing knowledge'.

Digging Deep: Examining Core Values and Identity

> *"Experience linked to one's social past… must be mobilised in research, on condition that it has previously been submitted to a rigorous critical examination. The… past which remains present and active in the form of the habitus has to be socio-analysed".*
>
> Bourdieu (2007: 113)

Habermas (1984, in Cohen, Manion & Morrison, 2017) reminds us that when researching social phenomena, the social practices and cultures of the actors involved must be considered. Waring (in Coe et al, 2017:18) encourages us to be mindful that for those adopting an interpretivist stance, 'facts cannot be separated from values'. An examination of personal values and identity is necessary for the researcher, as each individual brings with them the 'baggage' of their 'previous life experiences… to any research context' (ibid:17). Reay (2018:10) contends that for every professional, the individual's weight in their field is 'always a consequence of an originary habitus'. The influence of social experiences remains significant, even for those 'whose habitus has been transformed' by academic and professional progression; we cannot understand habitus without analysing our economic and cultural backgrounds (ibid:11).

A personal social audit reveals how early experiences bound up in family attitudes and expectations influenced my habitus. Reay (2018: 15) calls upon Bourdieu's ideas on resistance and accommodation, noting that the dominated 'are socialised by the very conditions in which they live… they are therefore often determined… to accommodate to their situation'. Bourdieu (2007:110) writes of 'semi-controlled schizophrenia' and Reay (2018:16), argues that many working-class academics engage in a 'conciliation of contraries' that generates what Bourdieu's terms a 'cleft habitus'.

The presence of at least a somewhat divided habitus is evident in accommodations made during my professional life and academic journey. Though 2 of my cousins gained university degrees a decade before me, ours was the first generation of my family to entertain the idea of 'going away' to university. Though we represent what Reay terms the 'agentic' among the working class, she calls upon Bourdieu (1990b: 90) in noting that we are the 'individual trace of an entire collective history'. When offered the promise of social mobility through academic progression, tensions described by Reay (2018:11) as 'powerful binary discourses of them and us' can occur. A university education was considered by my family to be an enormous privilege, a daunting undertaking rather than a natural

extension of post-18 education. 'Approved' study was in the disciplines of science or engineering, a truth which 'went without saying' on the part of our elders. It seems possible that electing to study the 'natural choice' of STEM courses at university allowed my generation to remain true to our roots when progressing to careers as science teachers and engineers.

Early discourses around how fortunate we were to be able to consider Higher Education 'considering where we were from' and on the comparative value of the disciplines to be studied, 'what knowledge holds worth' speaks of a doxa (Bourdieu, 1984:1986) born of deep-seated habitus and limited cultural capital. Internalisation of family dialogues on work and education may have influenced my gaining a First in Computing and a Master's degree in Education without setting foot in a 'conventional' university classroom in full-time study, electing instead to 'learn while I earned', safe in the more informal academic environments of the Open University and 'HE in FE'.

Having elected not to go on to university at the age of 18 due to family circumstances and desire for financial stability and independence, lifelong learning had a significant influence on my later life. Progression into Higher Education allowed a significant career change from broadcast engineering to education. Once teaching, I noticed the profound effects that FE had on my learners, particularly adults of my own age studying Access to HE programmes, and teenagers given a 'second chance' after less successful school experiences.

I have little doubt that my experiences in FE, both as learner and teacher, shaped my identity, values and habitus as an educator. Reay (2018:16) views formative experiences as 'crucible-like', quoting Bourdieu who holds (2000:78) that 'the present amounts to little compared with the long past in the course of which we were formed'. A lasting imprint of experiences casts FE in my mind as a powerful equaliser of opportunity, allowing working class learners to cast aside ingrained family habitus of 'our place in the scheme of things' or to swim against the tide of their recent educational history.

My Role as a Teacher Educator: Praxis, Praxis, Praxis

My transition into teacher education and the attendant focus on reflective practice also impacted upon personal philosophy. Biesta (in Gregson et al, 2015:4) contends that teachers must think critically about what they do, how and why as 'good teaching cannot do without judgement'. I concur with his assertion. Rather than slavishly following received curriculum, I consider that a key part of my role as a teacher educator is to encourage new teachers to question their identity and purpose as practice is 'constituted by purpose(s)' (ibid:5). I feel priviledged to work with trainee teachers and see need for mindfulness regarding what Biesta calls 'the appropriateness of our actions' and reflection upon what students may take, either intentionally or inadvertently, from how we do what we do (ibid:7).

Biesta categorises educational purpose as existing in 3 overlapping domains (ibid:5). The first 2, qualification (transmission of knowledge and skills, development of ability to undertake tasks and to function in society) and socialisation (into existing traditions, cultures and ways of doing) would likely be commonly acknowledged as educational purposes by those moving into teacher education having been a vocational student. The third domain 'subjectification' has philosophical rather than pragmatic or cultural roots, relating to 'how we exist' (ibid:6) and 'which qualities we seek to promote' in learners (ibid:7). An examination of the subjectification domain calls to mind the words of Bourdieu (2007) who asked educators to consider how adopted cultural patterns and 'ways of being' impact upon one's potential for dis/empowerment and how development of capability for critical reflection might influence the individual's future agency (Biesta, in Gregson et al, 2015:4).

I hold that my role as a teacher educator is to ensure that new teachers consider their impact across all 3 of Biesta' s domains as he urges us (ibid:6) to use 'moments of judgement' to 'organise and enact' our practice based upon our values. (ibid:7). A critical judgement moment is required during conflict situations where we find tensions between our core values and the facilitation of a contrary, mandated curriculum. I must prepare new teachers for such professional conflict situations, for circumstances where they find themselves pressured to enrol students onto courses to secure 'viable' numbers or feel obliged to enter learners for exams purely to achieve favourable success metrics. As practitioners, we may find ourselves 'pulled in different directions' and required to make 'trade offs' (ibid:8) to accommodate the different interpretations of educational purpose held by practitioners, managers and those funding and judging vocational education. An important part of my role is developing the critically reflective capabilities which will encourage new teachers to consider how values influence actions when professional conflicts occur, the building of praxis.

I am an advocate of FE's potential to transcend a 'skills for work' agenda, I see my role as empowering individuals to find the voice and the confidence to participate fully in work, community and political roles. I concur with Biesta (2018:18) that teaching is 'not about the production of things'; students are 'human beings we encounter in educational relationships' rooted in communication, not production. Biesta (ibid:18) notes that teachers must consider their purpose and develop the 'art called praxis', the 'good action' whose aim is to ensure that learners can 'be(come) subjects in their own right… not stay or become objects of the actions and directions of others'. My own concept of teacher agency is underpinned by a clear moral purpose where 'trajectories of action' are reconfigured in response to 'actors' hopes, fears, and desires for the future' (Priestley and Biesta, 2015:5-6).

Importantly, I hold that an adult learners' empowerment extends beyond the individual, enabling them to encourage and support their families and wider social communities to follow suit in personal development. Educators should work with political intent towards a more egalitarian society. I concur with Habermas (1974, in Cohen, Manion & Morrison, 2017) and Freire (1993) that emancipation is the core purpose of education, having benefited hugely in terms of personal empowerment from my time as an FE learner. The socio-analysis of 'the past which remains present and active' (Bourdieu, 2007:113) is necessary; my past has a bearing on my research work which seeks to analyse other educators' experiences of the building of professional practice and praxis.

The image of ethical practice to which I aspire draws upon 'practical wisdom' (phronesis) addressed in the literature review. Heilbronn (2011 in Gregson et al, 2015:49) makes a connection between practical judgement and 'virtue' contending that good teachers exercise 'an ethical sense of doing what is right' to develop a 'pedagogical space of trust'. I hold that while we must be flexible in our pedagogical approaches, our judgements nevertheless display a 'rootedness within character… informed by our values' (ibid:50). This fine-balanced practice requires teachers to display 'courage and qualities such as patience and optimism' as well as being open-minded and ready to learn from experience (ibid:50).

The use of 'practical wisdom' or judgement presupposes that teachers are able to exercise agency in their practice, something which I hold is at the core of authentic teaching and learning. Priestley and Biesta (2015:1) contend that teacher agency, a recurring theme in this thesis, is problematic as teachers can 'distance themselves from their personal values in order to play the game' of policy adherence (2015:3-4). I hold that authentic teacher education and CPD requires movement beyond a narrow 'property' agenda-meeting definition of professional learning to adopt a broader 'ecological conceptualisation' of agency as an 'emergent phenomenon' in which individual teachers respond to 'engagement with their environments' (ibid:6).

Community and Dialogue at the Centre of Praxis

As an active member of both online and more traditional face-to-face communities of practice I concur with Priestley and Biesta (2015:7), holding that discourse is an essential element of agency, a process by which actors engage in 'collectively organized contexts of action' (ibid:7) with others. Key to meaningful discourse is the presence of strong 'horizontal' informal relationships with 'high levels of trust'. I concur that professional dialogue allows educators to not 'just comply' but 'creatively mediate' policy acting autonomously in alignment with 'deep-seated principles' (ibid:16). I would contend that the core of such identity-focussed, 'principled reflexivity' (ibid:16) is 'praxis'.

This stance permeates not only my work as a practitioner and teacher educator but also influences my identity as a researcher. Hammersley (2012:2) contends that educational research may be aimed at 'producing knowledge', improving 'practices and institutions' or demonstrating 'what works'. Alternatively, research may be 'committed to challenging inequalities' and such work requires the researcher to engage in a dialectic around the distribution of power and cultural capital.

I would concur with Kemmis (2010:9) that any 'educational action is a species of praxis', involving 'morally informed and committed action' (or Aristotelian praxis). Dialogues around praxis help 'shape social formations and conditions' for groups of practitioners (praxis in a post-Marxian sense), 'help people live well in a world worth living in' (ibid:25). Kemmis adopts a pragmatic view of praxis calling it a 'practical philosophy' and argues (ibid:9) that research on praxis is only achievable by those whose praxis is 'both their proper work and… the focus of their critical investigation'. I would hold that as a teacher educator/practitioner-researcher I am attempting to achieve precisely these aims in this thesis; my underpinning belief is that the purpose of education is to 'help people live well in a world worth living in' and I am attempting to study 'praxis and practice traditions from within' (ibid:9).

No Neutral Observers Exist

Foucault (1980, in Alasuutari, Bickman & Brannen, 2008:10) when writing on the 'power-knowledge couplet' holds that 'forms of knowledge imply and use forms… of power' so 'no neutral observer position exists'. Social researchers, then, must consider the questions they ask, enquiring 'from which perspectives are they relevant and whose interests does the knowledge produced serve?' Educational research, like investigations in any field where sponsorship is provided, may be prone to neo-liberal 'market steering', dependant on funding or intended audience (ibid:11) and this is an issue with which I have struggled personally.

This thesis has already promoted the work of Coffield (2017) and O'Leary (2012) who question, respectively, the imposition of professional standards upon educators and the measurement of performance against performative standards. This is an area of interest yet considerable tension for me. I participated in the consultation which informed the ETF (2104) Professional Standards and the Foundation sponsored my research, bringing the Practitioner Research Programme which facilitated this thesis into being.

The underpinning ideals for both my practice and my research have much in common with a critical educational research approach (Cohen, Manion & Morrison, 2017:52), even if critical research methods are not employed in the thesis. Aspects of a critical approach are particularly suited for practitioner researchers conducting small scale research on 'operations of power', seeking to understand actions and interests at work (2017:66). The opening chapters in this thesis have adopted critical research lenses by investigating phenomena 'against the background of wider socio-historical context' (Hammersley, 2012:25). The literature review examined 'how power is produced

and reproduced' and 'whose interests are served' (Cohen, Manion & Morrison, 2017:52). While performing a critique of the CPD agenda in FE and investigating the value of informal learning, I would go so far as to say that I do not consider my research to be 'on teachers', but rather 'for teachers', undertaken in partnership 'with' teachers.

Methodology Musings: Post-modern Ideals, Not Ends

When considering methodological approaches, tensions between past and current ontological and epistemological thinking had significant influence and the decision was far from straightforward. The small-scale study of educators' use of social media groups for informal learning engaged in during this thesis appears to have much in common with a post-modern paradigm, casting me as an investigator of local, limited phenomena rather than a nomothetic agent seeking a metanarrative (Cohen, Manion & Morrison, 2017:2) or over-arching, generalisable theory (Coe et al, 2017). Many philosophical aspects of post-modern approaches fit well with my identity and values in their celebration of 'difference, diversity' and 'multiple realities' as well as their relativistic perspective on 'what constitutes worthwhile knowledge' (Cohen, Manion & Morrison, 2017:24). Importantly, as I am a contributor to the social media-based dialogues investigated in this thesis, the post-modern paradigm acknowledges that 'the researcher is part of the world they are researching' (ibid:25).

Post-modernism may appeal to me paradigmatically because its ideals resonate with my epistemological position through 'support of the interpretivist paradigm' and I also perceive a correlation with my values and identity in post-modernism's support of critical theory (ibid:25). Post-modern ideals chime with discussions of tensions between the mandated FE CPD agenda and teachers' opportunities for exercising agency to engage in discourses around 'what goes unsaid' in formal, mandatory CPD. The post-modern/critical theory focus on the emancipatory potential of valuing diverse perspectives and the possibility of 'a revolt against… cultural control' through a 'questioning of received wisdoms' (Pring, 2015 in Cohen, Manion & Morrison, 2017:25) echoes themes emerging from the overview of FE the sector and the review of literature in this thesis.

Ideals aside, adoption of a post-modern methodology and associated methods appear to be a less appropriate fit for this thesis. I intend my research to produce practical findings which teachers can use in dialogues around the direction and focus of their professional learning. Such pragmatic aims are at odds with the methodological attributes of post-modern paradigms, the untestable 'grand theories' and 'large-scale conceptual frameworks' (Cohen, Manion and Morrison, 2017: 73). As postmodern research is typically 'abstract and removed from a specific situation', yielding metanarrative results 'largely of no relevance to the everyday world' (ibid:73) it appears an unsuitable paradigm given the pragmatic aims of this thesis.

A critic may point out that some strategies employed later in this thesis when examining social media dialogues stray close to post-modern methods such as discourse analysis. This thesis certainly does engage in a thematic analysis of online dialogues as a 'springboard' for practitioner interviews and has already discussed power dynamics and their reproduction in earlier chapters. It does not, however, have an 'explicit agenda of critiquing inequalities' or seek to 'transform and emancipate society and its members' (ibid:687) even if it may document how practitioners may seek emancipatory aims in their own online dialogues.

Method Trade-Offs: You Can't Always Get What You Want

Educational research is an 'iterative and often negotiated process' involving 'trade-offs between what one would like to do and what is actually possible' (Cohen, Manion and Morrison, 2017:3). Beginning academic and working life in a scientific environment leads a researcher to favour

quantitative data-focussed approaches, which suggests an experimental methodology which seeks to verify hypotheses through empirical tests with researcher remote from subjects (Coe et al, 2017:18). Progression to study of social sciences prioritises idiographic approaches centred on collection and analysis of qualitative data using hermeneutic and dialectic approaches (ibid:17).

My initial plan in the face of these tensions was to accommodate competing influences in an eclectic approach borrowing from different paradigms. A mixed methods approach can mean that validity is strengthened by the use of method triangulation, combining different methods with unique attributes to allow weaknesses in one to be offset by strengths in another. My particular rationale for a mixed methods approach is based on its value on the grounds of 'development' whereby findings from one method help to inform the next. There is also the possibility of 'initiation' by which 'paradoxes and contradictions lead to a reframing of the research question' (Biesta, in Coe et al, 2017:159).

Previous research undertaken for PGCE and Master's qualifications and for informal action research projects involved the use of an initial questionnaire to inform and frame later work. I intended to continue with this strategy and tool, seeking to gauge the number of hours of CPD in which FE teachers were engaging, which topics were addressed, the rationale for undertaking CPD, what form the activity took and if and how CPD was logged. I considered that use of an online questionnaire would afford automatic collation of results, employing an empirical, logical, positivist approach with the researcher remote and detached from the subjects. Quantitative data could be collected and processed using statistical measures to attempt to produce a model of the situation. Outcomes from the questionnaire might be used to inform the direction of 1-1 interviews and the use of methodological mixes (questionnaire with quantitative data collection, informing interpretive, qualitative interviews) might strengthen the research design (Biesta in Coe et al, 2017).

Use of an initial questionnaire can also allow collection of valuable qualitative data and I planned to encourage participants use free prose comments following the multiple-choice main body of the questionnaire. Gathering detailed, narrative comments can yield richer, deeper data allowing a researcher to better understand the reasons behind actors' responses (Biesta in Coe et al, 2017). I hoped to also be able to invite participants to provide contact details allowing me to invite them to participate in further stages of the research if they were agreeable. I felt confident in my choice of online questionnaire as several respected peers undertaking contemporary post-graduate projects were beginning their research with similar questionnaire tools, so I believed that this reinforced the legitimacy of my decision.

I aimed to follow the questionnaire with 1-1 interviews and small focus groups allowing me to engage more fully with subjects to attempt to understand how each individual 'creates, modifies and interprets the world' (Cohen, Manion & Morrison, 2017:6). The validity of quantitative measures may be checked by use of qualitative techniques and I hoped that use of interviews and focus groups might allow a deeper understanding of the situation through establishment of causal explanations, providing 'thick descriptions' of behaviour (ibid: 19). A methods mix, that of 1-1 interviews and focus groups, both semi-structured, provides further technique variety. The use of 2 focus groups in addition to 1-1 interviews allows participants to interact with each other, rather than allowing an interviewer to dominate the agenda, enabling several people to stimulate discussion and a group to work together, much like social media-based online communities themselves. (Denscombe, 2014:189).

Biesta (in Coe et al, 2017:162) terms my planned design 'sequential' in nature as 1-1 interviews intended to yield 'deeper understanding' follow collection and analysis of initial questionnaire data in a quan -> QUAL sequence, the quantitative aspects being first in completion yet subordinate in

importance. This strategy involves a mixed methods approach at the 'data' and 'method' levels of the mix (Biesta, in Coe et al, 2017:160), combining textual and numerical data and different methods of data collection and analysis. As participants may agree to participate in 1-1 interviews following the remote, online questionnaire there is potential for use of a 'design' mix of interventionist and non-interventionist designs. Mixing of methods at the data, method and design levels is termed 'relatively uncontroversial' by Biesta (ibid:160) as we do not reach questions of 'what knowledge is' or issues around the nature of reality which would be faced at the epistemological or ontological levels of his model.

There could be said to be a tension here with 'paradigm wars' as Kuhn contests that use of competing paradigms within a field is incompatible (Alasuutari, Bickman & Brannen, 2008:14). Opposition to mixed methods research (MMR) has now lessened, however, and 'attitude of pragmatism has permeated the field' seeing researchers 'prioritizing finding out whatever is needed' to address objectives (ibid:19-20). MMR can provide a 'more complete picture of the phenomenon under study' overcoming the weaknesses of single-strategy approaches and potentially increasing reliability through triangulation to 'reduce bias… and enable compensation between strengths and weaknesses of research strategies'(Cohen, Manion and Morrison, 2017:33).

Use of questionnaires and 1-1 interviews are established techniques with much underpinning theory I can call upon. Beyond their use, I knew that I wanted to find a way of reflecting the richness of dialogue that is now 'out there' online in social media communities. I had undertaken reading on ethnographic techniques (Hitchcock and Hughes, 1995:118) and how these may describe the 'cultural knowledge' of a group using social interaction and naturalistic 'insider accounts'. I had in mind that I could use 'netnography' (Kozinets, 2015) to develop an understanding of cultural behaviour in an online domain, a technique employed when researchers 'immerse themselves' in the culture of a 'digital tribe' (Bartl, Kannan & Stockinger, 2016:167). Netnography nods towards a critical realist perspective, seeking to identify and examine emergent properties in informal networks as well as a pragmatic one as it addresses 'the quality of experience as well as sheer facts on the ground' (Sennett, 2009: 286). This netnographic notion took a back seat to the element driving the research at the time, the development of the online questionnaire.

When I began designing the online questionnaire, I encountered practical and ideological challenges. The former are not uncommon as common difficulties with questionnaire tools include low response rates, under-representation of sub-sample groups, partial completion and lack of ability to follow up if contact details are not shared (Cohen, Manion & Morrison, 2017:251-267). Practical challenges notwithstanding, ethical issues of intrusion, possible feelings of obligation experienced by participants during 'push' forms of data collection and the challenging issues of response anonymity also needed to be considered (ibid:267).

I was willing to wrestle these challenges but harboured doubts around the questionnaire design and most importantly its fitness for purpose. To get the picture of formal and informal professional learning I sought would require an extensive 'tick box' questionnaire or a more open text-based tool, entailing a significant amount of involved responses from participants. Both may be onerous, the latter ran the risk of open questions being highly open to interpretation, raising hermeneutic concerns in the use of loaded, ambiguous words such as 'effective' or 'formal' (Culler, 1997). Despite several attempts I found it impossible to create a design which satisfactorily overcame the obstacles.

The impasse was serendipitous as an important question to have asked at the outset is '*what will the questionnaire responses actually tell you*?' Even with a favourable response rate and collection of useful qualitative data, both far from guaranteed, I would still be left proclaiming that '55% of the sample engaged in formal CPD in the last year' and '70% considered informal CPD valuable'. Would

this really add to knowledge on the nature of informal learning? My experiences may be said to be somewhat typical of one engaged in the 'messy' nature of practitioner-led action research with its 'untidy realities' (Mellor, 2001:465).

A spontaneous discussion with my supervisor showed the true power of unplanned, informal learning. She prompted me to reflect on the parallels between my options of quantitative or qualitative methods and educators' choices to undertake formal or informal professional learning. I was invited to consider that there may be a connection between a need to work with empirical data and the requirement to quantify progress and 'tick off' competencies from a list of professional standards. ETF's (2018b) self-assessment tool invites practitioners to assess their skills against each professional standard on a scale from 1 to 6 and I realised that the online questionnaire was demanding a similar check-box reckoning from my research subjects, acting explicitly against the cautions of writers (Coffield, 2017, Sachs, 2003, Scales 2012, Sennett, 2009 & Wiliam, 2009) quoted in my literature review. Gardner, Holmes and Leitch (2008:96) speak of an 'obsession' with the search for quantitative data, holding that this tight focus can lead the researcher to neglect the subjective data emerging naturally from 'complex and untidy social contexts'.

I recalled the thoughts of Whitehouse (2011) who concluded that judgement of CPD efficacy called for subtle, complex analysis and 'far more sophisticated measures than simple, statistical ones' with holistic data 'afforded equal importance'. The findings of Gregson et al (2007:6) and Darling-Hammond (1999:39) returned to me with their call for a holistic, 'illuminative evaluation' not one 'constrained by the codification of knowledge'. I realised that I needed to reject the questionnaire as a data collection method as when respondents are required to answer 'in terms of categories already decided by the researcher' we risk reducing participants 'to data objects rather than agentic people' (Cohen, Manion & Morrison, 2017:120).

Past positivist influences, my self-imposed research orthodoxy and the effects of peer pressure had me convinced of the need to quantify that which is informal, 'caught in the grip of a picture' but 'blind' to the 'conditions for its realization' (Anderson, 2000:195). I had been drawn in by the comfort of quantitative certainty, falling back on ingrained methodological habits. This risked me engaging in dialogues with teachers around their professional learning not to judge development but, as Coffield (2017:41) notes, to determine how well they 'comply with a stream of… policy changes' as 'part of their professional responsibilities'. Sennett (2009:265) might refer to such a positivist questionnaire as 'superficiality… put to particular use' so I decided, nervously, to abandon this tool and embrace what Costello, McDermott and Wallace (2017:2) term 'connective ethnography' by using netnographic techniques followed by 1-1 interviews and small focus groups as my data collection methods.

Regarding Research Rigour

Validity and reliability, the measures of research rigour, have different meanings in quantitative, qualitative and mixed methods-focussed research (Cohen, Manion & Morrison, 2017:245). When research has a qualitative methods preponderance, as this work does, validity 'concerns the extent to which an instrument measures what it claims to measure' and regards the 'meaning and interpretation' of data collection outcomes (ibid:242). External validity can be viewed as 'an irrelevance' for those undertaking research using qualitative methods as the research does not 'seek to generalize only to represent the phenomenon being investigated, fairly and fully' (ibid:247).

Lincoln and Guba (1985, in Cohen, Manion & Morrison, 2017:247) contend that those using qualitative methods should 'replace positivist notions of validity with 'authenticity''. Relevant measures of rigour will now be considered in relation to the work being done in this thesis using the

validity measures proposed by Maxwell for qualitative researchers: descriptive validity, interpretive validity, theoretical validity, generalizability and dependability (ibid:247).
Regarding descriptive validity, the 'factual accuracy of the account', I need to ensure that reported accounts are not 'selective or distorted' and are a credible, 'objectively factual' description of occurrences (Maxwell, 1992 in Cohen, Manion & Morrison, 2017:247). As a solo researcher, I may attempt to improve descriptive validity by undertaking naturalistic enquiry with regular 'member checking' seeking participant validation. By giving participants opportunities to evaluate, contest and expand upon netnographic findings and approve the transcripts of interviews I can seek to ensure that my conclusions are considered and that participants' contributions have not been misunderstood or misreported (Lincoln & Guba, 1985 in in Cohen, Manion & Morrison, 2017:253). Although 1-1 interviews and focus group work may yield rich data, a facilitator may influence the range or nature of the responses obtained or considered significant. Data may be 'as likely to embody the preconceived ideas of the interviewer as the attitude of the subject interviewed', so to combat subliminal integration of preconceived ideas I need to use general, unstructured, open-ended interview questions (Kreuger, 2000).

Providing subjects with feedback and sharing interpretations of contributions can help descriptive validity and aid interpretive validity, the need to 'catch the meaning, interpretations, terms and intentions' that situations have for participants Meaning misinterpretation can be further minimised by paraphrasing and restating responses, through use of supplementary questions and by asking participants to clarify and expand upon initial contributions (Maxwell, 1992 in Cohen, Manion & Morrison, 2017:248).

Use of low inference descriptors when recording netnographic findings and capturing interview and focus group responses can also aid descriptive and interpretive validity (Burke Johnson & Christensen, 2014). Seale describes how use of low-inference descriptors, 'recording observations in terms that are as concrete as possible' and including verbatim accounts rather than employing 'reconstructions of the general sense' can minimise the risk of the researcher's 'personal perspectives' influencing their reporting (1999:148). The use of direct quotations, where permitted by informed consent, allows readers to experience protagonists' authentic voice and can provide a deeper insight into personal meanings (Cohen, Manion & Morrison, 2017). Along with critical description and auditing of research methodology, use of low inference descriptors can serve to improve neutrality and reduce researcher bias (Johnson & Cristensen, 2004).

A challenge with use of small-scale, qualitative research is the tendency for the work to have low generalizability; the theory generated may not be useful in understanding similar situations (Maxwell, 1992 in Cohen, Manion & Morrison, 2017:248). Engaging in data collection over a period of time for the netnographic study and with diverse participants with experience in different FE settings may serve to raise the generalizability of generated theory somewhat (Johnson & Cristensen, 2004) and can ensure that some data triangulation has been performed (Cohen, Manion & Morrison, 2017). Though my research is unlikely to yield widely generalisable results, I can attempt to engage with educators from large general FE colleges, adult and community learning and smaller independent training provider and work-based learning locations across a wide range of subject specialisms. It is also ideal to aim to interact with contributors with a balance of gender, diversity in age and differing number of years' experience in the sector.

Theoretical validity may be difficult to achieve in qualitative research, but extended fieldwork may promote the 'quality of explanation' provided by theory (Maxwell, 1992 in Cohen, Manion & Morrison, 2017:248). If a theoretical justification developed from the research matches the data collected, the piece of research can be deemed credible. This can only be achieved, however, after sufficient time has been spent studying the research participants and their setting. A researcher may

then be more confident that their observations are detailed enough to encompass significant factors at work and so better understand relationships between actors (ibid:248).

As a lone researcher, my work lacks investigator triangulation. Reliance on the analysis of a single investigator can affect the dependability of findings over time and their descriptive validity as an individual may make ontological and epistemological assumptions (Denzin & Lincoln, 2013). Use of low inference descriptors and verbatim presentation of quotes can help to minimise incorrect interpretation and the unintended influence of a researcher's own value system (Johnson & Cristensen, 2004). I am not working in a research team, something which may reduce the risk of biased interpretation, though Denzin and Lincoln (2013) note that the involvement of multiple researchers may also cause challenges in amalgamating conflicting analytical viewpoints. Peer examination and critique of data and peer auditing or 'debriefing' of the conclusions of the research can be a useful compromise to extend dependability and reliability (Lincoln & Denzin, 2003:172). I am fortunate to have the keen eye of a supervisor and can call upon several practitioner researcher peers as we engage in reciprocal review arrangements.

Caught in the Net: Rationale and Process for the Netnographic Analysis

Ethnography, the 'descriptive, analytical and explanatory study of the culture, values, beliefs and practices' of a group or groups (Cohen, Manion and Morrison, 2017:292), has undergone a logical evolution for emerging, online contexts in the shape of 'netnography'. A portmanteau term coined by Kozinets (2010a) from 'network' and 'ethnography', netnography seeks to obtain pictures of the lived experience of participants in online communities.

Originally employed in market research into 'digital tribes and… behaviour', netnography is now making 'growing contributions to academic research' (Bartl, Kannan, & Stockhiger, 2016:1) with 'widespread use' as a qualitative method in 'diverse research settings' (Costello, McDermott & Wallace, 2017:1). As such, netnographic techniques can be suitable for use in a critical investigation of new informal online educators' networks due to their focus on 'emergence' and 'value creation and empowerment' (ibid:4). Costello et al (ibid:4) in an echo of Wenger's (1998) work on communities of practice state that netnography recognises that 'cultures of online communities are constructed by the members… invested in their development' so 'any construction of theory should be derived from the community'.

Kozinets (in Hall 2010:279) contends that netnography is a valuable tool to 'study derived virtual communities' and for 'investigations of identity and the construction of a digital self'.
Kozinets (2010a:12) further holds that online communities 'form or manifest cultures, learned beliefs, values and customs' that 'order, guide and direct' behaviour. Like its precursor, ethnography, netnographic activity seeks to obtain 'descriptive knowledge' of a group's cultural context by examining 'patterns of social interaction' and employs 'insider accounts' to develop theory (Hitchcock & Hughes, 1995: 52-3). Rather than being 'collected' in a conventional, sense, Kozinets (2010a) notes that netnographic data originates from digital imprints of naturally occurring public conversations, so must be considered an application of ethnography to online contexts rather than a search for societal phenomena conducted in the digital domain, a different activity which he terms 'digital ethnography'.

Netnography may be successfully combined with other research methodologies (Costello, McDermott & Wallace, 2017) an attribute which makes it suitable for use in this thesis in conjunction with other planned methods. Kozinets (2015:42) states that netnography like its 'older sibling', ethnography, is 'promiscuous' using a variety of techniques and approaches, so its high levels of adaptability mean that it integrates well into a multi-method approach. This mixed methods

approach is one described by Costello, McDermott and Wallace (2017:2) as 'connective ethnography', involving a researcher in 'offline interviews and online textual analysis' allowing an analysis of 'relationships between participant behaviours and words' in online and off-line domains.

Netnography has the benefit, as a naturalistic technique, of having higher credibility than methods which may be more easily influenced by researcher input. Netnography's 'unobtrusive nature' and 'non-influencing monitoring' yield the pragmatic affordances of gaining 'practical insights' into behaviour' (Costello, McDermott and Wallace, 2017:2). The netnographic researcher 'neither desires nor is able to exert control' over the situation so behaviour is shaped by the agency of participants (Cohen, Manion and Morrison, 2017:462). Subjects voluntarily provide netnographic data naturally and unprompted, so virtual communities are valuable spaces for researching 'development of understanding, of perception, of processes where negotiated meaning is important' and for investigating 'dynamics that generate consensus and discord' (ibid:461).

An additional pragmatic benefit of a netnographic approach is that data can be transcribed directly from online communities, providing a less costly and time-consuming method of collecting data. A further benefit suggested by Kozinets (2015) is that online dialogues provide persistent digital data giving opportunities to go 'back in time' to view antecedents of significant communication threads.

Capture of authentic voice may be another motive to lead a researcher to use netnographic strategies. Online discussions may be more likely to take place using what Habermas termed 'ideal speech' as social media channels offer 'opportunities to circumvent traditional power relationships' and may create a 'greater likelihood that individuals may feel free to express themselves' (Cohen, Manion and Morrison, 2017:458). Burbules notes that an 'online disinhibition effect' may make virtual dialogue participants likely to 'more freely share their academic work, or feelings and problems that they might not reveal offline' (ibid:462). That said, Burbules holds that the 'messy democracy' of social media dialogue 'affords particular kinds of robust interaction' which can be 'productive and creative' but also 'hypercritical and forceful' (ibid:462).

Social media dialogues have 'significant potential to disrupt established modes of interaction or hierarchies of authority and power' and sometimes 'remake them' (ibid:462). This presents the possibility that the personally and politically sensitive discussions which occur in virtual worlds between teachers discussing life, job roles and professional learning in performative times may be more authentic in nature than some face-to-face dialogues, a persuasive reason for using netnographic techniques. Netnography may therefore be well suited to 'dealing with personally or politically sensitive topics' discussed by individuals in 'marginalised groups' (Costello, McDermott and Wallace, 2017:3). Kozinets concurs, describing netnography as useful in studying 'situations, conversations, or encounters, which might otherwise be more difficult to study face-to-face' (Costello, McDermott & Wallace, 2017:3).

Gleason (2016:33) holds when speaking of Twitter forums that despite the 'ubiquity and high consumption' of this form of social media, 'surprisingly little research' has been done exploring why and how forums are 'used to make meaning', offering 'considerable opportunity for new studies' Selwyn notes that use of platforms such as Twitter in formal settings such as educational institutions offer 'rich opportunities to study changes to the historical imbalance of power' afforded by educational uses of technology' (Costello, McDermott & Wallace, 2017:459). Examination of Twitter dialogues, then, may give us opportunities to explore the 'space between institutionally managed systems and non-institutional personal usage', a valuable undertaking as 'such liminal areas are… fascinating third spaces' (ibid:459).

Regarding netnographic scope, Costello, McDermott & Wallace (2017:6) note that a researcher may interact with several groups or with 1 during netnographic work, holding that engagement with several communities may aid generalizability. Johnson and Cristensen (2009:6) contend that working with several communities will 'add context, enhance information, and yield insights' into 'consequential' issues that would 'otherwise remain invisible'. Kozinets (2010:89) encourages netnographers to search for online communities which have 6 essential attributes in order to engage in a successful netnographic investigation. The communities must be relevant to the research focus, have regular, current activity, be interactive in terms of dialogue, be substantial, have a critical mass of communications and energy, be heterogeneous with sufficient variety of participants and be data-rich in terms of detail of dialogue and descriptions.

Kozinets (2010a) notes that netnography's 4 essential elements are a 'story' (or emotion), the researcher, key source person(s) identified and a search for cultural fluency. Story facets are drawn out by examination of rich samples of dialogue and the data analysis stage is followed up by interviews, which may be online or face-to-face, to explore deeper stories behind the subject. The strength of this strategy is the ability to obtain rich, contextualised data then seek thematic resonances within it (Bernard & Gravlee, 2015:471). Kozinets (2010a) contends that the netnographic researcher is not simply a software operator but an integral individual whose personality and interventions enrich the work; they should have a deep and fluent understanding of the culture surrounding communications and be cognisant of contextual nuances and symbolic language being used. Though working with 'unpredictable and abundant' data, they may navigate layers of meaning and be able 'to argue for a central tenet' emerging from it (Kozinets, 2015:2). I hope that having eighteen years' experience in the FE sector and having been a long-standing member of several online educators' communities means that I meet Kozinet's expectations.

Outcomes of netnographic activity can be divided into 4 categories (Kozinets, 2015 in Cassell, Cunliffe & Grandy 2017). Classification depends on whether the work supports the status quo (complementary) or challenges it (critical) and whether the focus has a global or local scope. The most common, 'symbolic' form of netnographic study is a local-complementary one examining identities, practices and meanings within a particular field. 'Auto' netnography takes a critical-local form; the researcher examines data through the lens of their own identity focussing on personal, autobiographical elements. A 'digital' approach is complementary-global one seeking cultural understanding from mass social data. The final, 'humanist' form addresses questions with social importance or influences social change, casting the researcher in an advocate/activist role. I appear be working in the critical-local category though there appear to also be symbolic, local-complimentary aspects to online community analysis. Finally, a humanist, critical-global form of netnography may be relevant for this thesis as the forums are sites for activism and may be promoting social change in the wider workplace through a critical research stance.

A challenge with use of a netnographic strategy is one that Kozinets (2010a) notes, that researchers are a key element in data collection but often have flexible levels of social interaction as participant or non-participant observers. I am an active member of some of the communities I propose to study and have participated in some form in numerous educators' social media communities, so this casts me firmly as an insider researcher, a challenge discussed later in this chapter.

A Social Network Approach to Netnographic Research

After auditing netnography's suitability for my purposes, I decided to employ an approach built on an application of social network analysis (SNA) as an alternative to the initial online questionnaire on teachers' CPD. The SNA method, initiated in relational sociology for studying community networks, is recognised as valuable for investigations of networked learning (Laat et al, 2007). The method

analyses relationships between actors in a network and/or the exchanges of dialogue between them. Traditionally, SNA uses graphical sociograms comprising individuals (represented as nodes) and investigates the (offline) interaction links between them (Wasserman and Faust, 1994).

Social network analysis is growing in popularity in qualitative applications in social media contexts, because it has proven able to produce the rich data valuable for understanding complex research issues (Webster & Morrison, in Alexander, 2009). Martinez et al (2003:368) note that SNA applications meet a need for 'innovative techniques for study of the new forms of interaction' emerging from online dialogues and Laat et al (2007:88) propose that SNA can 'assist in describing and understanding the patterns of participant interaction' online.

My intention was to combine SNA with a non-participatory netnographic approach, observing, analysing and categorising interactions on educators' online communities with the choice of networks guided by Kozinet's (2010:89) community attributes. Graphical mapping strategies, adaptations of those suggested by Borgatti et al (Vicsek, Kiraly & Konya, 2016:87) were to be employed, allowing multiple networks to be analysed based on 'attribute, social relations/role, interactions and flows'. Selected significant tweets or segments of tweets could then be rendered to convey a richer picture of the dialogues taking place.

SNA mapping was intended to produce a content map of the social networks' activity. I considered this an appropriate non-participatory technique for use in an initial exploration of each networks' dialogue themes. I hoped that using this 'connected ethnography' strategy in the SNA/netnographic approach would allow me to perform a thematic analysis of the dialogues held on online educators' networks. I employed Braun and Clarke's (2006) approach where, after initially gaining familiarity with the data, the researcher generates initial codes, searches for and reviews themes and then defines and names the emerging themes. Using this approach, I sought to identify key dialogue topics and to investigate the nature of educators' interactions.

The aim of the SNA strategy was to develop online dialogue categories in a nod towards a grounded theory approach where theory is 'not predetermined', but 'rises up from the ground of data' in a 'bottom-up' process seeking to generate new theory rather than simply test an existing model (Cohen, Manion and Morrison, 2017:75). The creation of a 'dynamic and contextual model' which considers 'how relations create meaning' by considering the 'narrative of the network' was my aim (Vicsek, Kiraly & Konya, 2016:89). I planned that online dialogue narratives would be captured using network pictures which conveyed an understanding of relationships, interactions and dependencies in the networks under consideration.

I also hoped that a non-participatory, thematic analysis may enable me to identify online community members who Kozinets (2010a) terms key participants as they display 'centrality, brokerage, and prestige' based on their embeddedness and influence in each online community (Vicsek, Kiraly & Konya, 2016:87). I proposed to engage with these key sources during subsequent 1-1 interviews by adapting the 'egonet' approach proposed by Emirbayer (1997) in which a respondent (the ego) is questioned about the relationship and interactions between themselves and a specific other (the alter) using techniques such as 'name generator' exercises (Marsden 2005). I did not intend to use this strategy in its original, bottom-up form to investigate pair relationships across a network, but sought instead to attempt a qualitative investigation examining the motivations and desired professional learning outcomes of teachers using the educators' networks as well as their perspectives on their user experience (Curran & McCarroll, 2016).

Though valuable for investigations of participant behaviour, SNA is best used in conjunction with other analytical methods if a researcher wishes to gain an accurate picture of networked,

collaborative learning experiences (Martinez et al, 2003). A mixed methods approach allows data triangulation and complementary, qualitative methods can include interviews and content analysis from the networked communities concerned (Curran & McCarroll, 2016).

Challenges of Using Research Methods While the Ink is Still Wet

As we might expect from an emerging research method, there are a variety of interpretations of the required stages in a netnographic study. Kozinets (2002: 4) contends that netnography's 'rigorous online guidelines' combine with 'an innate flexibility' to make the technique 'novel, but still faithful to scholarly depictions' of traditional ethnography. Kozinets (ibid:4) has set out an initial framework of overlapping netnography stages: making cultural entrée, gathering and analysing data, ensuring trustworthy interpretation, conducting ethical research and providing opportunities for member feedback. With respect to 'cultural entrée' Kozinets (2010b:5) describes this as using focused research questions to 'reach out' to 'investigate the different online fields where a culture or community expresses and gathers'.

Netnography is still evolving as an approach and Costello, McDermott and Wallace (2017:5) note that while some researchers adhere to Kozinet's frameworks, others have 'adapted or omitted particular steps to suit their study' or have 'customized' the process adding identification of research questions to its steps. (ibid:5). Netnography's 'procedural steps provide rigor' (ibid:1) an attribute valuable to me as a new user of the technique; I will be looking for both rigour and some flexibility in terms of the framework I will be using.

The significant challenges of ensuring theoretical and descriptive validity during content analysis when using a netnographic approach may be overcome by adopting an active, participatory approach. Member checking allows netnographers to 'expose their frameworks to be challenged' by community members, eliciting valuable feedback as a means of ensuring the 'trustworthiness of their study' (ibid:8). This is important as Hall (2010:278) notes that netnography calls upon a researcher to exercise significant interpretive skill due to the potential 'lack of informant identifiers' in online contexts which can lead to 'difficulty generalizing results outside the sample'.

Hall notes that a 'lack of visual cues' from online data, compared to techniques such as personal interviews, may result in a 'loss in layers of information'(ibid:279). Absence of cues such as 'tone of speech and body language' may mean that the 'real meaning and intention' of contributors may be harder to determine. That said, Hall notes that a shortage of visual cues can remove distractions and result in interpretations being 'grounded in context rather than stylistic elements' (ibid:279). Kozinets (1998:370) contends that interpretive challenges can be balanced by 'careful use of convergent data' and use of 'a mix of offline and online collection methods'. The plan to investigate several online teachers' communities with inter-group member checks followed by 1-1 interviews to seek clarification, theory critique and deeper meaning from contributors aims to bolster theoretical and descriptive validity in this thesis.

That said, providing the types of hard evidence favoured by sector leaders and policy makers is challenging as emerging or short-term changes in nuanced areas such as development of teachers' practice can be 'implausible or difficult to observe'. This challenge leaves researchers employing qualitative methods call upon soft indicators of impact as 'conventional quantitative and qualitative evidence is rendered impractical' in small-scale practitioner research (Gardner, Holmes and Leitch, 2008:89) such as this thesis.

Robust, Quantitative Impact Measures or Wisps of Smoke?

A significant concern for the qualitative researcher is a consideration of the concept of data itself and whether it is regarded as that which is 'measured or interpreted, created or gathered' and 'whether this act has value' (Gardner, Holmes & Leitch, 2008:95). An 'obsession' with the search for quantitative data can lead the researcher to neglect 'subjective, anecdotal or impressionistic' data, even when the gathering of conventional quantitative data due to timescales, resources or 'complex and untidy' social scenarios is unrealistic. In such complex cases, the existence of 'much-derided' subjective data is 'a powerful source of evidence' (ibid:96).

A mixed methods piece of research such as this thesis gives the researcher the opportunity to gather 'multi-various items' of data which can 'cohere into a mutually supportive and therefore arguably credible source' of evidence of impact (ibid:97). Multiple corroborating arguments can be threaded together to form a strong cable 'whose fibres may be ever so slender, provided they are sufficiently numerous and intimately connected'. Impact can be identified through a reasonable interpretation of the 'strength and variety' of subjective, anecdotal data into an 'illuminative evaluation' because 'where there is smoke, there is (the potential) for fire' (ibid:98).

This thesis sets out to explore the value of informal online professional learning to FE teachers using the authentic voices of the educators engaging in it as a 'reporting procedure for facilitating vicarious experience'. It employs storytelling vignettes to 'portray complexity… convey holistic impression, the mood, even the mystery of experience' (ibid:89). In doing this, the thesis values the information gleaned from 'impressions' and 'untidy sources' where conventional evidence is difficult to obtain as knowledge can come to us through a network of 'prejudices, opinions, innervations, self-corrections, presuppositions' and through the 'firmly-founded but by no means uniformly transparent medium of experience.'

Ethics and The Insider Researcher

My ongoing involvement in some of the online educators' communities used to conduct research may not pose a significant disadvantage as Costello, McDermott and Wallace (2017:1) contend that 'passive, non-participatory approaches' to netnography can 'miss opportunities for ongoing co-creation in online communities'. Researchers who are engaged in 'active, real-time participation in their netnographies… contribute to important online social narratives' (ibid:1). Kozinets concurs (2015:96) stating that it is 'erroneous' to steer netnography towards 'unengaged content analysis' as it is, by nature, 'human-centred, participative, personally, socially and emotionally engaged'.

Netnographic researchers may be 'narrowing rather than expanding the scope of research' by minimising engagement with online communities. Netnographic enquiry implies a 'need for human presence' in communication, it involves the netnographer 'being part of the research' as a core aspect of their role. The netnographic scenario may expand into co-creation as a 'mutual text is created' when sharing a research role as researchers 'require and acquire information' and 'both parties contribute to an ongoing dialogue' (Costello, McDermott & Wallace, 2017:8).

All researchers must give serious consideration to ethical issues which arise during their research, particularly during the connected ethnographic approach being adopted in this thesis. As an active member of the virtual communities and a user of them for my own professional learning, I am cast solidly in the roles of insider researcher and participant-observer. Zeni (1998:9) notes that when teachers undertake study into their own practice the teacher-researcher duality causes 'many of the traditional guidelines collapse' and blurring of role may be particularly true for participatory

netnographers. Zeni contends that the study of one's own practice raises 'sticky, ethical issues which may never be addressed' (ibid:9).

That said, I may call upon the advantages of being an insider researcher. Bonner and Tolhurst (2002:13) hold that I will not be viewed as a 'stranger' by group members, so may find acceptance, trust and co-operation easier to gain. I may also be able to bring 'traditionally ignored or unrecognised perspectives into theory'. My familiarity with the research environment may also allow me to be 'more economical' with language and jargon and importantly, from both ethical and credibility standpoints, and be 'less inclined to construct stereotypes' (ibid:13).

Though I may leverage significant advantages, benefits from ease of access and improved credibility in the researched community may be offset by losses in impartiality. The insider researcher may not be considered a researcher at all by some but rather as an 'advocate' who may exhibit bias in interpretation or in the conclusions drawn. Researchers who are established members of a community must not form a reliance on better known community members with whom dialogues are 'comfortable' but I will also need to be aware that I should avoid focus on 'dramatic events rather than the routine' (ibid:13).

There are doubtless tightropes to be walked regarding research ethics and credibility when one embarks on insider research in online, social scenarios. Bonner and Tolhurst contend, however, that though insider researchers begin with their own 'expectations, assumptions and theories', these are valuable when forming 'tentative propositions' that can become 'important aspects of valid discovery' within a field. Insider researchers have inherent knowledge of how an investigated system 'really works' which can provide rare opportunities to 'gain impending characteristics of… practice that would otherwise be difficult to access' (ibid:14).

A First Step into the Messy Minefield of Online Ethics

Undertaking work around professionals' social media use presents significant ethical challenges for any practitioner and the BERA (2011) ethical guidelines are a valuable starting point when establishing an underpinning ethical stance and associated research procedures. It is notable that though developments in digital networks and growth of dialogues on social media platforms has been fast-paced and constantly evolving over the last decade, UK researchers were working, until 2018, with ethical guidelines formulated in 2011. Since the BERA (2011) guidelines were framed, digital artefacts such as video blogs and podcasts and dialectic social media communities such as Twitter chat forums have become ubiquitous. Working with 8-year-old guidelines in a time of fast-paced change is a matter of significant concern for the researcher.

Though the BERA (2011) guidelines have some valuable overarching direction on the use of online sources, I considered that they failed to provide sufficient specific guidance for digital researchers, unsurprising given their publication date. After searching for newer ethical guidelines for social media-based research, I read works by Townsend and Wallace (2014) and Williams, Burnap and Sloan (2017) which had both currency and validity as both works were referenced in several core ethical guides for researchers.

It was a timely reminder of the 'messy' nature of research (Mellor, 2001:465) when, shortly after I completed the first draft of this chapter, BERA published an updated fourth edition of their ethical guidelines (BERA, 2018). This brought me eye-to-eye with the 'untidy realities' of research (Mellor, 2001:465). I embraced Mellor's call to take a 'positive view' regarding setbacks and to faithfully document 'mess' as part of an 'honesty trail' which adds strength to the work (ibid:465). The new BERA guidelines note that ethical decision-making is 'an actively deliberative, ongoing and iterative

process' (BERA, 2018:2) needing reassessment of the situation as issues arise, requiring researchers to 'keep up to date with changes in data use regulations and advice' (ibid:13).

I reminded myself that this is my first work at this academic level, so I am 'learning my craft' as a researcher. I take comfort in Sennett's (2009:48) assertion that 'to do good work means to be curious about, to investigate, and to learn from ambiguity'; skill is built as 'the rhythm of solving and opening up occurs again and again'. I drew on relevant sections from several sets of ethical guidelines, returning to augment my ethical procedures and this chapter with reference to guidance from BERA's (2018) guidelines once they were released and able to inform my ethical process.

BERA (2018:4) describe social science research as 'fundamental to a democratic society' and as such it must be 'inclusive of different interests, values, funders, methods and perspectives'. Research processes must respect 'privacy, autonomy, diversity, values and dignity of individuals, groups and communities'. Researchers need to be mindful of their social responsibilities to 'aim to maximise benefit and minimise harm'. Trust is an 'essential element within the relationship between researcher and researched' (ibid:12).

My work during interviews and focus groups did not involve contributions from anyone under 18 years of age and was conducted solely with professional educators voluntarily discussing their informal use of social media, so did not involve anyone classed as an 'at risk' adult. Contributors represented themselves as individuals rather than speaking on behalf of their organisation or any other grouping. No interactions with communities or individuals asked participants to divulge details regarding their being marginalised because of 'age, culture, race, gender, sexuality, socio-economic standing or religion', dynamics which would have called for particular sensitivity (ibid:12). That said, I was aware that ethical issues arise in 'sensitive situations influenced by contexts of cultural difference' (ibid:12). While engaging in dialogues regarding manager-educator or observer-educator relationships I needed to be aware of power dynamics and differentials which may have impacted upon the individuals and the contributions made.

Contested Ethics Frameworks and Ill-informed Consent

Townsend and Wallace (2014:3) note that current ethics frameworks inform those working in the digital domain 'to some extent', but the research community now faces 'new contextual challenges' and traditional ethics frameworks leave researchers 'not equipped to deal with' such challenges. Williams, Burnap and Sloan (2017:1150) concur, contending that the 'digital revolution has outpaced parallel developments in research governance and agreed good practice'. Townsend and Wallace (2014:9) hold that a 'one size fits all' approach with definitive answers to digital ethical issues is not a workable proposition so 'principles need to remain flexible' using 'guidelines as opposed to rules'. Williams, Burnap and Sloan (2017:1150) disagree, however, calling digital ethics addenda 'bolt-on' guidelines and criticising any stance contending that overarching digital guidelines are impossible to construct, leaving the digital researcher in an ethics hinterland.

The BERA guidelines (2018:7) note that 'it is important to remember that digital information is 'generated by individuals' and though some social media platforms allow individuals to retain a degree of privacy, others do not. Some social media platforms allow participation through use of pseudonyms or avatars rather than requiring full disclosure of identity and some provide on-screen notifications when dialogues are being recorded. Other platforms require participants to log in using verified full disclosure of identity or to be invited to join dialogues and give an ability to be aware of others' presence. Several platforms, including my own area of research interest, Twitter, allow participants to post messages to publicly accessible forums yet give a researcher no opportunity to ascertain a contributor's identity with any certainty if they choose to use a pseudonym. In terms of

message lifecycle, it is not possible to establish who has viewed posted content until messages are 'liked' or 'shared', producing a notification, or to know if or when contributions are quoted or more widely used. These complexities require a researcher to give careful consideration of 'whether and how… participants might be traceable' (ibid:13) as confidentiality and anonymity are 'considered the norm for the conduct of research' (ibid:21). I also need to remain aware of the possible consequences to participants should they be 'identified by association or inference' (ibid:23) as online dialogues can be cross-checked and interrogated with relative ease through use of search engines.

The BERA guidelines inform us that producers of publicly accessible digital data 'may not have considered the fact that it might be used for research purposes' so if a message is publicly posted to social media it 'should not be assumed that such data is available for researchers to use without consent'(2018:10). Researchers need to be 'attuned to differences' between content specifically written for public consumption or research use (such as a published blog or online journal article) and more spontaneous social media discussions (ibid:11). Though informed consent would not normally be expected for data 'produced expressly for public use' there remains 'no consensus' as to whether participants in social media communities 'perceive their data to be either public or private' even when agreement to terms and conditions of use of a platform means that copyright and usage rights have been waived. BERA contend that consent should be addressed on a case-by-case basis by considering the 'presumed intent of the creators', the extent to which research identifies individuals and the 'sensitivity of the data' (ibid:11). Williams, Burnap and Sloan (2017:1159) agree, contending that dialogically, Twitter 'blurs the boundary between public and private space'.

Townsend and Wallace (2014:9) suggest that researchers begin by consulting the latest terms and conditions of the online platforms that they intend working with regarding third-party data access and use. A complication arises here in the shape of the fluid nature of each online platform's terms and conditions, a fluidity necessary in any complex system which is evolving through extended use of augmented and virtual reality content. The authors of the terms and conditions for use of Twitter (2018) describe 'an evolving set of rules' for users whom they describe as partners in 'an open ecosystem', acknowledging parallels with evolutionary processes seen in living organisms.

Twitter's terms of use (Twitter, 2018) reveal that users who post content 'grant a worldwide, non-exclusive, royalty-free license' enabling Twitter to 'use, copy, reproduce, process, adapt, modify, publish, transmit, display and distribute' content. Importantly, Twitter's terms of use make it clear that its users agree 'to let others do the same', making their dialogues 'available to the rest of the world' (Twitter, 2018). Though Twitter's terms of use make permission for re-use of posts a given, from a stricter ethical standpoint a key judgement is whether social media users can 'reasonably expect to be observed by strangers' (Townsend & Wallace, 2014:10).

When participating in dialogues via social media, users often actively draw attention to topics in their posts with a hashtag (#) symbol to highlight a key word or theme, making it easier for fellow users to follow posts about that topic. Active attention-drawing using a hashtag could be said to make questions of privacy 'less problematic', but Townsend and Wallace (2014:5) contend that the public/private status of a social media post is one of the 'biggest areas of concern' for researchers. They note (ibid:5) that it is 'problematic' for researchers to claim that their actions are ethical 'simply because the data are accessible' and hold that an evaluation of research ethics 'cannot be ignored simply because the data are seemingly public'. It is 'tempting to conflate' agreement to terms and conditions which include re-use of data by third parties with informed consent, but reuse can be 'problematic if users have not read or understood' a platform's complex terms of use (ibid:5).

Unlike an incidence of participation in a private group with a moderator acting as a gatekeeper, it may be inferred that a Twitter user has no reasonable expectation of privacy. The use of the ubiquitous hashtag (#) symbol to highlight a key word or theme may be considered to be an instance of deliberate 'broadcasting' (Townsend & Wallace, 2014:5). When, in open discussion, participants elect to 'broadcast their opinions using a hashtag' to 'associate their thoughts on a subject with others' thoughts', this type of dialogue contribution 'can be considered public' (ibid:5). That said, researchers must be aware that participants' understandings of privacy in online spaces may be 'inaccurate' and such ambiguity regarding privacy raises ethical concerns requiring researchers to inform the community about how data will be used (BERA, 2018:18).

An advantage of my research is that it will focus entirely on examining the core topic content of text-based dialogues rather than expanding into areas of richer media use such as investigation of user profiles, locations, personal images, audio, video or published texts. That said, there are other issues of anonymity when using direct quotes from online posts which may not arise with more conventional methods such as face-to-face interviews. Townsend and Wallace note (2014:7) that a communication such as a Tweet, if quoted verbatim, in significant part or as a whole, may be traced by use of a search engine, potentially exposing the poster to 'embarrassment' or 'reputational damage'.

An added complication arises when a Twitter user deletes a Tweet which has been quoted in research, or even deactivates the Twitter account itself. It remains unclear whether post or account deletion has any form of equivalence to conventional withdrawal of consent for research participation. BERA guidelines consequently state (2018:23) that anonymity is 'much harder to guarantee in digital contexts' as social media sites have usage policies which require participants to register and provide identification at sign-up. In online research contexts, if authors of postings withdraw or delete data then that data should not be used in research. However, since it will not be possible for researchers to identify withdrawals after data has been harvested, a proviso could be offered in the ethics considerations that data were used 'as made available to the public' at the 'date of harvesting' (ibid:18).

Choosing Sides in the Online Ethics Dialectic

My initial plan for avoiding traceable, verbatim quotes of entire Tweets was to employ partial Tweet usage or a 'bricolage style reconfiguration' of data to convey participants' intended meaning. Williams, Burnap and Sloan (2017:1162) advise that researchers should not abandon plans to convey social media platform users' authentic voice due to concerns regarding ethical issues (ibid:1162). After further reflection, I concluded that this approach did not ensure that data could not be traced back to an identifiable individual.

Having considered the competing ethical stances and strategies that a researcher into social media dialogues might adopt, I agree with Williams, Burnap and Sloan's (2017:1162) position that researchers must go beyond the minimal expectations put in place by a social media platform's constructs of accepted use and 'informed consent and anonymity are further warranted'. Other netnographic researchers concur, Hall (2010) noting that ethical concerns hinge on whether online forums are thought of as private or a public space and on what can be thought to constitute informed consent. As the profile information or data which Twitter participants provide is not given specifically to the researcher, provided in confidence or given under an agreed usage agreement, contributors who create social media content may not 'intend or welcome' its wider use.

Kozinets reinforces this strong ethical stance by commenting (Hall, 2010:282) that a researcher should 'ensure confidentiality and anonymity of informants'. I therefore concluded that I would

undertake a thematic analysis of threads from educators' Twitter dialogues via an examination of keywords and hashtags, but would not include any direct, partial or bricolage-style quotes from individual or organisational Twitter users in this thesis. This seemed to be the only secure way of guaranteeing participant anonymity and adopting an ethical approach.

Another important ethical factor regarding use of posts from open networks is the need to ascertain whether the researcher has 'similar interests' to the users (Townsend and Wallace, 2014:10). If I were to embark on research examining incidents of unprofessional behaviour by teachers on social media platforms, this could be viewed as a case of a researcher having conflicting interests to her research subjects. To the contrary, as an insider researcher who uses the online educators' communities for her own informal professional learning, I do not set out to deliberately debunk the groups' value or cast doubt upon the actions or motives of their users. My aim is rather to obtain evidence of any worth that online dialogues have to informal professional learning. My challenge is to remain impartial while not overstating their value, a stance which casts me as a researcher with similar interests to the online community members.

I must be mindful, however that any sense of ethical comfort due to 'similar interest' does not automatically bring with it a false sense of safety that my research findings will be neutral in terms of impact on my reputation. Townsend and Wallace (ibid: 11) note that insider researchers should not disregard the importance of their own privacy and reputation by placing the ethical focus solely on protection of other contributors.

Finally, Townsend and Wallace (2014:9) state that researchers must adhere to rules imposed by their university, organisation or funding body. I completed the University of Sunderland ethical approval process before beginning this thesis and took advice from the supervisors overseeing my programme of study. They were able to confirm that my stated uses of social media were ethical and that proper permissions had been sought from research subjects, Sunderland University's ethical approval process was completed before data collection began on this thesis.

Well-Trodden Ground: Ethical Considerations for Interviews and Focus Groups

When planning the 1-1 interviews and small focus group data collection activities, I was able to draw on longer-established ethical rules and procedures compared to the emergent guidelines consulted when preparing for the netnographic analysis. Adhering to the BERA (2018) guidelines, I ensured that informed consent was obtained from all interview and focus group participants. All contributors were required to read and sign the agreement shown in Appendix 2 which sought to ensure that all participants were fully aware of the nature of their contributions and informed about the purpose and eventual use of the research work. All participants were given the opportunity to ask additional questions and discuss any ethical or practical concerns having read the consent document. Participants were under no obligation to participate in the research and it was made clear that they may choose to withdraw permission for participation at any time. Participants were assured that their anonymity would be preserved throughout within the limits of accepted bounds of legal disclosure (BERA, 2018:9). No names or specific locations that would allow identification of a contributor is included in the work and direct quotes are used only with specific permission.

The informed consent participation agreement document was piloted with three potential participants who are practitioner researchers themselves. They gave critical feedback on the document's completeness and clarity before a final version was decided upon. This consultation exercise draws on the work of Stenhouse (1975:142) who recommends that teacher-researchers partner with a 'critical friend' who might act to aid progress by engaging in peer support.

More research 'messiness' occurred in the form of an added complication arising just before the start of the data collection process as the Data Protection Act (1998) was superseded by new General Data Protection Regulations (GDPR) (ICO, 2018). This update to data protection law had been anticipated as it had been well publicised by the Government in advance. The changes did not have any effects on the data management principles employed in this research such as secure storage, data updating or the requirement to destroy data which is no longer relevant. The change to use of the GDPR from the DPA was noted nevertheless on the participant consent form and notice was given that all data would be processed and stored in adherence with the new legal requirements as data collection spanned the change of data protection frameworks. As someone who runs an independent training provider and is the organisation's Data Nominee, I have undertaken updating training on the GDPR's requirements and put measures in place to ensure that they were adhered to during the research activity.

Finally, Some Research Questions!

An investigation of the use and value of online, informal professional learning by educators in FE in England has been alluded to as the purpose of this thesis, but readers might consider that it seems unusual to have travelled so far into a discussion on research methodology with no mention of research questions. Research questions are often stated before any consideration of methodology, rigour or ethics, but it is in this respect that netnography can differ from other research methods. Biesta et al (2018:1) note that 'the field and disciplines of educational research, and the practices that have traditionally served them, are in question' and we need to ask 'difficult questions about the nature and role of evidence' used in educational enquiry (ibid:2). It is important that 'what counts or should count' as educational research and the procedures used to undertake it remain 'contested' (ibid:4).

Bernard and Gravlee (2015:471) contend that netnographic research questions 'can emerge naturally' from the research setting rather than from the 'preconceptions and agendas' of the researcher. Having an 'extended time' of observation or pre-research participation in 'online reality', which I have been fortunate enough to have, allows a researcher to 'develop meaningful and relevant' questions and hypotheses using a 'go with the flow' attitude. The authors (ibid:472) note that it may be helpful to start with outline questions even if these are 'uncomfortably vague' and later 'abandoned for more intriguing ones' as work develops. I hope that this bodes well for my proposed strategy of beginning with non-participant observation and SNA of online dialogues to a yield a thematic analysis of educators' networks; this can later be followed by 1-1 interviews to yield richer, contextualised data from which alternative or reframed research questions may emerge.

Kozinets (2010:81) suggests formulation of initial research questions is appropriate for netnographic inquires. The researcher should 'ask one or two central questions' of a qualitative nature then form related sub-questions as required. 'Central questions' should be specific to the strategy of inquiry yet open-ended enough to allow an 'emergent research design… focussed upon the main phenomenon'. Given my reading on how thematic netnographic study of online dialogues incorporating SNA in connected ethnography may work, Kozinet's (2010) stance of formulating initial, central research questions and embracing emergence of further, or modified, questions as the work progresses offered a useful model. Framing initial questions allows preparations for the netnographic analysis and SNA approach to begin while leaving room for refinement.

Initial research questions:

1. How do FE teachers who participate in online educators' networks consider that they are engaging in meaningful professional learning?

2. In what ways would the topics addressed during dialogues in online educators' networks be regarded as key development areas for FE teachers by recognised sector bodies?

3. What evidence do educators report of any formal recognition of impact from informal online learning opportunities?

Lurkers and Insiders: Reaching Diverse Online Community Participants

Using Kozinets' (2010) suggested stages of a netnographic investigation, the data collection phase of my research began with selection of which open, online educators' communities should be examined. Ideally 2 or 3 appropriate communities should be chosen based upon Kozinets (2010:89) criteria for successful netnographic studies; these criteria will be fully explored in the next chapter. Appropriate online educators' community dialogue threads were examined to ascertain if the purpose and focus of the dialogues seemed well aligned to the needs of the FE teachers' CPD. The thematic analysis of threads from chosen communities had to be underpinned by references to a recognised structure and I hoped that it may be possible to categorise community dialogues by comparison to the ETF (2014) standards. This type of thematic review would allow the framing of a response to initial research question 2, *'In what ways would the topics addressed during dialogues in online educators' networks be regarded as key development areas for FE teachers by recognised sector bodies?'*

During the thematic review of online dialogue threads, I hoped to form initial impressions of which key community participants I might engage in the 1-1 semi-structured interviews and small focus groups. This would allow me to send out the study information/informed consent document to potential participants, respond to initial questions and obtain consent for participation.

When selecting which community participants to approach for interview and focus group participation, I aimed to draw upon Kozinets' (2010, in Hall 2010) categorisation of 4 types of online community users. I realised that it would be challenging for me to engage with those referred to as 'lurkers' as though they may be active observers, participation is restricted to watching and reading so they will not be identifiable. Kozinets (ibid:281) notes that lurkers can become 'networkers' by reaching into the online community to 'build ties and interact with the members'. I hoped to engage with newer users who are transitioning from lurkers to networkers to determine why new members are joining communities and gain their initial impressions. I also hoped to have dialogues with longer-established educator social networkers to ascertain why they find participation is of continuing value to them. It was also important to engage with Kozinets' (ibid:281) two remaining categories of online community user. I needed to involve 'interactors' if possible in the interview or focus group stage as they 'reach into' a community from other communities that are highly engaged with the specific activity' and 'insiders' who drive dialogue and are devotees of the community, perhaps even having moderation or steering roles.

By gathering the voices and views of diverse participants in 2 or more communities, a richer picture of community use and value may be formed in an exploration of research questions 1 '*How do FE teachers who participate in online educators' networks consider that they are engaging in meaningful professional learning*?' and question 3, '*What evidence do educators report of any formal recognition of impact from informal online learning opportunities?*' I aimed to engage, consent permitting, with a range of participants who exhibited a diversity of experience in the FE sector and facilitated learning in varied subject specialisms. I also sought to maintain a balanced gender mix and a diverse age range while engaging with those whose online participation spanned the range of participant categories suggested by Kozinets (Hall, 2010).

I hoped that semi-structured interviews and focus group work would enable to me to conduct a deeper analysis, building on initial netnographic modelling and working with richer data to fully explore questions around teachers' use of informal online learning. Of particular interest to me was whether common themes around desirable attributes of professional learning revealed in literature, and codified in ETF's FE Professional Standards (2014), could be found in any new model created of teachers' online dialogues. Are ability to exercise agency, development of evidence-informed pedagogy and vocational knowledge, growth of professional networks, exploration of values and building of identity key aspects of participation in informal communities for teachers?

The next chapter documents the data collection process and the formative analysis of the netnographic investigation and 1-1 interviews and focus groups, seeking to develop a model of informal online learning and to gather teachers' perspectives upon it.

Chapter Four: Impressions of Teachers' Informal Online Learning

Ontological, epistemological and methodological considerations having been considered, this chapter documents the data collection process. Online networks require 'renewed scrutiny' as there is little informed consensus on their form and impact, mirroring a general shortage of knowledge around informal CPD practices (Lantz-Andersson, Lundin & Selwyn, 2018:303-4). This netnographic work seeks to shed light on the first of these required areas of scrutiny, the form of FE teachers' Twitter dialogues. In exploring the online dialogues' form, this chapter seeks to illuminate the space allowing and informing discussions during the 1-1 interviews and focus groups on a far slipperier concept, the 'impact' of informal CPD. The chapter provides further commentary on the methods and strategies used and the challenges encountered. It summarises some significant outcomes and attempts a preliminary, outline review of emergent findings as an appetiser for the data analysis chapter to follow.

Making a List, Checking It Twice

Although a questionnaire-based, quantitative data collection approach was eschewed with the rejection of the online survey, it was key that the netnographic analysis which would inform and anchor the subsequent data collection activities be conducted on an evidence-informed footing. The netnographic work involved a content analysis of topic threads on active Twitter communities used by educators to determine whether they displayed a good alignment with the professional learning priorities of practitioners and stakeholders in FE.

Laat et al (2007:88) hold that a thematic dialogue analysis has value in 'describing and understanding' participant interaction patterns in online communities. During the netnographic work the stages of content analysis proposed by Denscombe (2017) were followed. This process involved defining the population for sampling, the sample to be included and the units of analysis, determining the codes to be used, constructing analysis categories, categorising data and summarising results.

The content analysis was designed to elicit an initial response to research question 2, **In what ways would the topics addressed during dialogues in online educators' networks be regarded as key development areas for FE teachers by recognised sector bodies?** It was vital to ensure that a reasoned decision be taken on the choice of informal online educators' communities to investigate.

The initial netnographic analysis of potential educators' online communities to determine which were the most suitable for use in the main netnographic activity underpinned all data collection. As an insider researcher, this choice was undoubtedly informed by my own informal, professional learning experiences in online educators' communities. As an active member of 5 such communities, I made a virtue of this fact by examining groups from which most value had been drawn in terms of own informal professional learning. Participation in educators' Twitter community dialogues had signposted new authors, resources, strategies and educational research and had provided opportunities to extend my professional network via both offline and face-to-face events. I sought to determine if this personal value was shared by other sector educators.

Bonner and Tolhurst (2002:13) note that though an embedded researcher may have ease of access to communities and improved reporting credibility, these benefits may be offset by a lack of impartiality. Over-reliance on personal experience, inclination to act as an advocate or an exhibition of bias in data interpretation or conclusions drawn may occur. To mitigate against these risks member-checking of findings would be required during the 1-1 interviews and focus groups. Descriptive validity and reliability cold be improved by questioning participants on their online

community participation (Lincoln & Guba, 1985). Member checks are also recommended by Kozinets (Hall, 2010:282) who notes that researchers should present their findings to research participants to 'solicit their comment'. The member checking process involved seeking participant feedback to validate models of community dialogue created, establishing which communities the participants found most valuable and why, exploring less positive aspects of community involvement and establishing whether community participation was formally acknowledged as CPD.

Member-checking could allow the initial netnographic study to be revisited and extended beyond the original choice of online communities if required through a further iteration of thread analysis using alternative communities proposed by participants. This approach modelled Gregson et al's strategy of 'formative evaluation' leading to 'illuminative evaluation' (2007:6) via a 'Report and Respond' strategy allowing stakeholders to comment upon the analyses developed (ibid: 76).

Harvesting the Rhizomes: Selecting the Online Educators' Communities

Maintenance of participant confidentiality was a key ethical consideration for this thesis. To provide an additional layer of anonymity (in addition to the decision not to quote whole or partial Tweets) pseudonyms were assigned to the 5 Twitter communities considered in the initial netnographic analysis. This decision was taken to minimise any possibility of thesis readers determining individuals' identities through their knowledge of Twitter communities. Online communities are termed 'rhizomatic' due to their unstructured nature and evolving, socially negotiated configurations and purpose, whereby 'community is the curriculum' (Cormier, 2018:1). In acknowledgment of this botanical analogy, and as a nod to my passion for gardening, each community was named after a rhizomatic plant, namely *Ivy, Lily, Fern, Nettle* and *Bamboo.*

I had drawn much value from participation in the Bamboo community. An established, well-used platform in existence since 2014, the group displayed hallmarks of an active community having over 4,000 members and both weekly themed dialogues and regular ad hoc posts. Bamboo was, however, deemed unsuitable for consideration as community founders described it as specifically focussed on teaching in Higher Education. The group did not possess the first of Kozinets' (2010:89) attributes for successful netnographic investigation as it was not 'directly relevant to the research focus'.

Of the communities which remained in my sphere of experience, all 4 community profiles described the groups as either intended for all teachers or specifically targeted towards FE educators, all 4 appeared on the surface to meet Kozinets' (2010) relevance test. The communities were examined further over an initial 2-week period for their suitability for the contextual Social Network Analysis activity against Kozinets' (2010) remaining desirable community attributes. Kozinets suggests that only established communities which have regular, current and substantial dialogues, exhibit a critical mass of 'communication energy' and exhibit participant heterogeneity should be selected. Researchers should also ensure that community dialogues are detailed and data-rich (2010:89).

The further analysis of suitability performed on the 4 remaining communities examined group descriptors and user and dialogue statistics, data readily available in each community's profile. At this stage, the work required brief use of a quantitative, positivist stance asking questions such as 'how many posts have there been?', 'how long has this community existed?'. Only later would the focus shift to a qualitative, interpretive investigation which enquired 'what are the core topics of these dialogues?', 'what is the meaning of them?'

All 4 remaining online communities met the first 7 of Kozinets' (2010) criteria; all had been active for at least 2 years, each had more than 700 followers, each had generated more than 6 hundred

separate dialogue threads since inception and all had at least 10 new topic threads in the 2-week period under initial consideration. The full comparative statistical analysis of the network activity can be seen in Table 1 in Appendix 3.

A more detailed analysis of discussion threads was then undertaken. Regarding units of analysis, as each Twitter thread is a dialogue on a particular, defined topic, an open coding process seemed suitable. The analysis sought to quantify the surface content of each thread to 'reveal what is communicated' (Denscombe, 2017: 313). A key aim was to confirm that each community's dialogues met Kozinets' (2010) benchmark of having direct relevance to the study, namely to the role of educators in FE. Once initial thread coding was completed, topics could be used in a detailed narrative content analysis to search for implied meaning and deeper dialogue implications (ibid:311).

A Tweet, not a Manifesto: Benefits of Brevity

A significant criticism of the reliability of content analysis centres on the purpose and form of the texts considered (Coe et al, 2017). Twitter dialogues have the advantage of being less susceptible to acknowledged reliability issues, namely texts being written for a different purpose from the researchers' aims, being limited or incomplete or being inconsistent or ambiguous in meaning (ibid:2017). The work of deciding which codes to use in content analysis is also somewhat simplified for Twitter dialogues due to their use of limited character messages, as a 280-character limit for Tweets is currently in place (Twitter, 2018). Tweets are direct and single-themed by necessity of brevity, so coding of individual Tweets may be light in nature, not usually requiring several codes to be attached to one post.

The directness of Twitter communications made the coding process relatively straightforward during the first iteration of content analysis. Twitter contributors' use of hashtags and keywords to highlight the focus of each post made the use of low-inference descriptors for message thread topics relatively simple (Kozinets, 2010). Explicit topic signposting allowed the use of codes which derived directly from the authentic words used in the Tweet, a strategy which tends to be more faithful to the source data as codes are 'responsive to, and emerge from, the data' (Cohen, Manion & Morrison, 2017: 669).

Once codes for the dialogue threads had been established, an online mapping tool *Coggle* was used to chart dialogue activity on each network. This first pass at content analysis served a broader purpose as coding enabled a preliminary mental analysis of emerging themes, allowing an initial working impression of key topics of interest to be formed. Twitter dialogue threads from all 4 educators' communities were examined for an initial mid-term, 2-week period when online communities seemed less likely to experience a reduction in activity due to FE holidays. Nevertheless, had results proved inconclusive, the potential to extend the study was available. A graphical mapping strategy of the type proposed for Social Network Analysis (SNA) by Borgatti et al (Vicsek, Kiraly & Konya, 2016:87) was used in which multiple networks may be compared based on 'attributes… interactions and flows'.

Thinning Out the Rhizomes So the Strongest Remain

An examination of the 4 groups' discussion threads over the initial 2-week period revealed that the Nettle community was by far the most vibrant group in terms of the number of new dialogue threads. Its high membership numbers and participation rates meant that it appeared to be of value to educators from a range of backgrounds. That said, it was found to have a dialogue focus

significantly favouring compulsory education. The Nettle network analysis map (Appendix 4, Figure 1) reveals that of the discussion threads which appeared in the 2-week period under initial examination, over 40% of topics specifically related to compulsory education. Threads included 'primary behaviour policy', 'should the school day be extended?' and 'e-safety for 5-7-year-olds'. Though there were some threads relevant to FE such as 'teachers' work-life balance', 'digital skills audits' and 'teaching creative thinking', it was considered that too high a proportion of the dialogues were school-related, so Nettle was not deemed a suitable community for further consideration.

The 3 remaining communities, Ivy, Fern and Lily, appeared the most appropriate for use in the full netnographic investigation. Dialogues met Kozinets' (2010) remaining suitability criteria as all posts were directly relevant to FE and a critical mass of data-rich replies was evident. An analysis of the topic threads on the Ivy, Fern and Lily communities revealed that the dialogues were well aligned to the CPD focus in FE, though educators participating in the 1-1 interviews and small focus groups would be the ultimate arbiters of issue alignment. These 3 networks were deemed suitable for an immediate, more extensive investigation of topic threads over a 6-month period, allowing a more substantial analysis of community dialogues to be performed.

The 6-month long Twitter analysis involved interrogation of 577 discrete discussion threads across the 3 chosen educators' communities. The number of threads per community can be seen in Table 1 below along with the corresponding number of discrete topics emerging from each community's dialogues.

FE Twitter community (pseudonym)	Number of Twitter threads (6-month period)	Discrete dialogue topics (6-month period)
Ivy	208	26
Fern	177	59
Lily	192	38

Table 1: Number of Twitter dialogue threads by community

The Ivy community has the smallest number of discrete topics, dialogue despite having the highest number of threads. This can be attributed to its established, structured organising principles. Weekly, focussed dialogues on a specific topic are proposed by community members who then frame and submit questions to the moderator for peers to explore and discuss around the topic. The community has the highest participant numbers of the 3 communities. The Fern and Lily communities adopt a more organic format with spontaneous, ad hoc posts from contributors, often related to stages in the academic year or posted in response to emerging sector developments or newly published research which are then engaged with by community participants.

Several recognised software packages are available for the netnographic researcher which aggregate hashtags and keywords and provide automatic coding of topic threads. Though undertaking a visual analysis of each Twitter thread's topic is a far more time-consuming process than use of automated aggregation, examination of posts 'by hand' allows a researcher to make notes on each thread topic, a task bypassed by automation.

Denscombe (2017:310) contends that though automatic curation packages (such as *Feedly, Storify* and *Curata* in a social media context) afford economies of time and effort, they should not be viewed as a 'quick and easy fix' due to the set-up time required and the learning curve for users.

Examination of 577 message threads was certainly exacting and time-consuming (taking almost a month to complete) but was nevertheless a valuable part of the netnographic activity. The work was akin to interview transcription, which Denscombe notes is 'laborious' but, I would concur, brings the researcher closer to the data as transcription 'brings the talk to life' (2017:307).

An example network activity map, from the Ivy community is shown below in Figure 1. Network maps documenting the dialogues of the 3 selected communities, Ivy, Fern and Lily, over the 6-month data collection period and the rejected Nettle community's 2-week map can be found in Appendix 4.

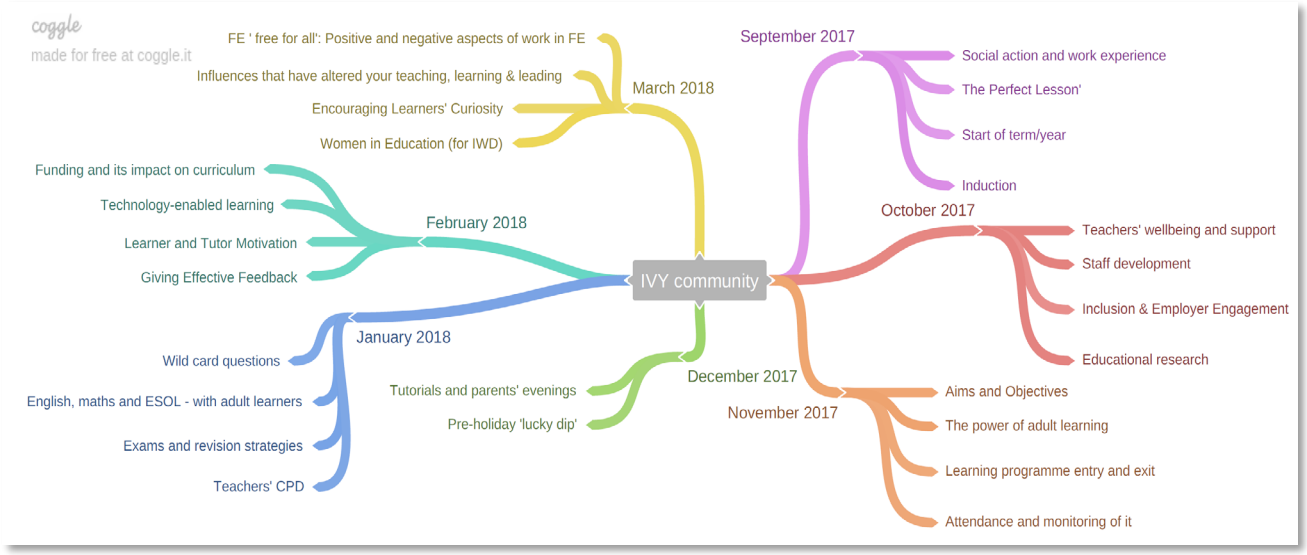


Figure 1: Network diagram of dialogues from the Ivy community

Sorting the Threads: Mapping the Online Dialogues

Once the network maps of dialogue threads for the 3 Twitter communities over the 6-month period had been created, the construction of analysis categories to be used in a comparative, thematic mapping of the community threads could begin. This aspect of the netnographic activity involved a conventional content analysis deriving thread meanings using a categorise, compare, conclude strategy useful for 'straightforward, simple' communications (Denscombe, 2017:314) which Tweets are intended to be. That said, Denscombe (ibid: 313) holds that any content analysis has potential to disclose hidden aspects of communication, independent of writers' conscious aims, revealing a 'deeper-rooted and possibly unintentional message'.

The individual network activity maps with their low-inference descriptors produced a great deal of relevant data. The content analysis would only be meaningful, however, if an appropriate way of categorising threads could be found. The intention was to adopt an 'inductive' category formation strategy in the form of a 'domain analysis', seeking to group content into 'themes and coherent sets' (Cohen, Manion and Morrison, 2017:677) which could be validated later by member-checking.

Research question 2 invited debate on which professional bodies should be considered as arbiters of the 'key development areas' for the sector. A logical solution appeared to be to categorise the dialogue threads using the overarching domains of the ETF (2014) Professional Standards or indeed

the individual standards themselves. Though the judgement of practitioners' performance against professional standards is considered a contentious approach (Darling-Hammond, 1999: Day et al, 2005: Sachs, 2003: Sennett, 2009), the ETF Standards are used as the basis for discussion of educators' CPD in the opening thesis chapters so their use in categorisation of educators' dialogue threads appeared appropriate.

Back to Square One When the Pieces Don't Fit

When the process of dialogue categorisation began, it became evident that a framework based on the ETF Standards had been a hasty decision as what seemed a good 'fit' on initial consideration broke down from a logical standpoint. Categories need to be exhaustive to address content validity (Coe et al, 2017) but the process of pigeon-holing dialogue topics into the ETF Standards 'box' which seemed the best fit was fraught with complications and contradictions.

Some dialogue threads, such as 'English and maths connections conference' or 'Postgraduate research in FE' could seemingly be mapped directly to an ETF standard, namely standard 16 'Address the mathematics and English needs of learners' and standard 8, 'Maintain and update your knowledge of educational research' respectively. Other threads such as 'social action and work experience' were impossible to link to a single standard, or even to two. Did the thread sit meaningfully with standard 5 'Value… equal opportunity and inclusion', standard 13 'Develop… skills to enable progression' or standard 19, addressing 'collaboration with employers'? Other dialogue threads such as 'Transformational teaching' proved equally challenging to assign to a standard.

Closer inspection of many threads revealed socio-political, curricular and pedagogy-related dialogic aspects spanning numerous standards, including 1 thread which encompassed sub-dialogues as diverse as educator collaboration, learning resource use and motivational theory. Reflecting further on this mapping tension and re-examining the threads it was clear that many dialogues could not be simply shoe-horned into a single, headline ETF standard. Denscombe (2017:316) notes that content categorisation is an iterative, spiral task in which codes and categories need to be redefined in a process which can be 'messy, ambiguous, time-consuming, creative and fascinating', but never linear nor 'neat' (ibid: 323).

While discussing learning theories with a group of new teacher educators, talk of Bloom et al's (1956) affective domain prompted reflection that I may not have appreciated how many threads involved identity-, attitude- or values-based dialogues alongside more pragmatic discussions. Though many dialogues directly related to curriculum design, classroom strategies, assessment of learning or the resources required to achieve pragmatic ends, multiple discussion threads focussed on the teacher as one whose role transcends learning and assessment. The theme of learner empowerment regularly emerged in relation to single learners or groups and discussions cast teachers as advocates for the power of education to impact more widely on learners' families in emancipatory dialectics. Other threads discussed educators' agency or moved beyond to focus on teacher activism and community emancipation. What seemed absent was the ETF standard that could wholly encompass these dialogues.

Locating the Teacher's Identity and Voice

A change of approach was adopted which did not completely reject, but rather subverted, unproductive categorisation attempts against the ETF's (2014) domains. Using a process of forming 'organising categories' into which different codes may fall (Cohen, Manion and Morrison, 2017:677), dialogues were grouped into three categories. The first 2 categories were termed 'practical

classroom discussions' (for example, threads on monitoring attendance, induction processes) and 'learning theory and pedagogy discussions' (motivation factors, inclusive assessment) respectively.

A new challenge related to interconnectedness emerged as these 2 categories had significant overlaps; a discussion on motivational theory often developed into a dialogue on the practical applications of that theory, a debate on uses of technology merged into an analysis of pedagogies informing its use. This interconnection suggested potential for amalgamation of the 2 categories around the concept of evidence-informed practice. A further category, entitled 'professional learning and supportive networking' (for example threads on postgraduate research and teachers' professional networks) appeared to be somewhat more tightly defined so stood up to scrutiny as a discrete category.

On the first attempt working with the ETF (2014) standards, the categorisation plan had been abandoned at a formative stage as it appeared impossible to place some dialogues logically into a standards-based category. Looking at the problem anew, all as-yet uncategorised threads falling outside the 'evidence-informed practice' and 'professional support and networking' categories were grouped into a temporary placeholder, in effect a 'none of the above' node to ascertain whether the remaining dialogues had common themes.

An examination of unassigned threads revealed that remaining dialogues had focus upon learners as a part of their wider community, learner emancipation and educator empowerment, or teacher values, identity and voice. The dialogues spoke to educators' socio-political values or personal ethical stances and so a third category considering these areas is a valuable addition to the model. Once this 'professional identity' category was in place, it appeared that all 'none of the above' dialogues could be said to be a good fit within it.

A First Look Through 3 New Lenses: Examining Educators' Community Dialogues

The complexity and range of educators' dialogues meant that a perfect dialogue-category fit was not a realistic expectation and Eraut (2000:133) reminds us that 'tidy maps of knowledge and learning are usually deceptive' as they may deny the complexity of messy reality. The model which I have developed is a focussing tool which allows forward movement, allowing an examination of the nature and scope of the Twitter dialogues. Offering the model for member checking, for consideration and critique by educators using the online educator's communities during later interviews and focus groups, allows Twitter community users themselves to speak to nuances and complexities in the use of informal professional networks.

After further reflection on nomenclature, dialogue lenses entitled the '**pedagogy'** lens, the '**learning community'** lens and the '**identity and voice'** lens were decided upon. Each lens was given an 'subtitle' providing a richer explanation of its dialogue content to aid explanatory potential during use in interviews and focus groups. A summary of the final allocation of dialogue topics under the 3 lenses in the model is illustrated in Table 2 below to transparently render the topics discussed under each lens:

The Pedagogy Lens: 'what we do in evidence-informed practice'	
English, maths and ESOL teaching for adult learners	**ESOL strategies**
Programme entry and exit	**Setting up adult book groups**
Developing learners' curiosity	**Access to HE curricula**

Learner motivation
Giving effective feedback
Developing and writing aims and objectives
The 'perfect lesson'
Evidence-based, technology-enabled learning
Inclusive learning spaces
Induction periods
Start of term / academic year
Technology-enabled learning tools
Tutorials and parents' evenings
Exam technique and revision strategies

Attendance and monitoring of it
Helping learners manage exam stress
Developing STEM skills
Giving feedback to learners
Challenges with Apprenticeship delivery
Mental health first aid in the adult curriculum
Topics for World Mental Health Day
Supporting refugee and asylum seeker learners

English, maths and Functional Skills delivery
Comparing vocational curricula
Apprenticeships pathways
Topics and resources for Mental Health Week
Providing relatable role models for learners
Access and ESOL programmes
Pedagogies for learner self-empowerment
Inclusive approaches to GSCE resits
Technology-enhanced learning approaches
Transformative approaches to learning
Socially situated v instrumentalist approaches

Socially situated knowledge in literacy curriculum
Accreditation mindsets – degrees in later life
SEN and transferable skills
Teaching creativity in the FE curriculum
Adult literacy in Offender Learning
Resources for Holocaust Memorial Day
Global literacies
Teaching the new GCSEs

The Learning Community Lens: 'how we connect and support each other to develop'

Teachers' CPD
Participating in educational research
Staff development events
Teachers' wellbeing and support networks
Sharing research from PCE journals
Digital Educator development
FE conference recommendations
Calls for educational research areas
The power of research participation/publication
Employer views/engagement in the Vocational curriculum

Master's / Postgraduate research advice
Making non-conventional CPD count – are we ignoring informal learning?
Twitter communities for educators
Failure to recognise research on FE's benefits
Teacher education networking meetings
Mentoring for teacher growth and change
FE impact research data
World Teacher's Day
Community and employer engagement

The Identity and Voice Lens: 'how we define our values and advocate for them'

Promoting women in education
The power of adult learning
Social action in work experience
Funding and its impact on curriculum
The 'White Curriculum'
Educational leadership
Data use implications for professionalism
Decolonising the curriculum
Democratic adult education
When did T&L become data?
Towards an anti-fascist curriculum
Diversifying stock image photography
Race and mental health
Equality: call for action in SEND inspections
Transformative FE – changing lives

Social Purpose Education
'Talking back to numbers' – rebuttals to statistics
Women's suffrage – 100 years on
FE empowering women
Mature students' voices
Response to Minister on power of FE
Challenging inequality
ACL and social mobility
'Cradle to Grave FE'
Literacy changes lives
Impacts of Adult Ed on health and wellbeing
FE giving belonging /community to SEN learners
Reclaiming 'identities of success' for learners
Widening participation in marginalised communities

If you have power, your job is to empower others **Ripple effect of learning on life, health and family** **'The Learning Age' 20 years on**	**FE as an enabler of escape from abusive relationships** **Literacy and democracy**

Table 2: Dialogue topics under the 3 lenses

Denscombe contends that graphical displays are 'particularly useful' in showing conceptual links and give 'transparency' to the analysis process (2017: 324). Creation of a graphical representation of the 3 lenses is therefore a useful tool to provide a simplified illustration of emerging dialogue themes. A map of the 3 lenses emerging from the theme categorisation is shown below in Figure 2.

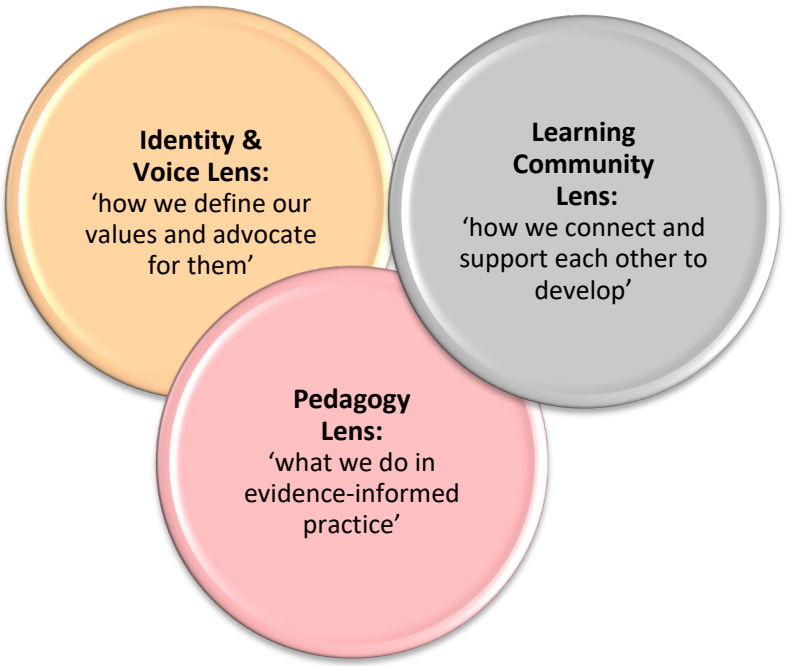


Figure 2: Three lenses of educators' online community dialogue focus

The review of literature reminds us of the importance of the development of evidence-informed practice and the building of professional learning communities as being key features of professional learning, as do the ETF (2014) Professional Standards with particular relevance to FE teachers' CPD. It is an encouraging early sign for the relevance and importance of informal, online dialogues and utility of the 3-lens model that two aspects of the model encompass evidence-informed practice and development of learning communities.

The semi-structured 1-1 interviews and small focus groups are the ultimate arbiters of the utility of the 3-lens model and the value of the informal online dialogues to participating educators. Having named the third lens '**identity and voice: how we define our values and advocate for them'** it is important to determine whether an agreed picture of professional identity emerges from teachers' informal online dialogues, to determine how community identity intersects with and diverges from the stated priorities of the FE sector codified in its Standards. There is a need to investigate how participants seek to use their voices in informal online dialogues and to what end. Dialogues falling under the identity and voice lens seem particularly worthy of examination to ascertain FE teachers' perceptions of their identity and how their voices are used to articulate core values and identity.

From Digital to Human Dialogues: 1-1 Interviews and Focus Groups

The netnographic work caused me to consider whether educators who exercise agency to undertake professional learning dialogues through participation in informal communities might also be more likely to engage in all types of CPD, both formal and informal. Furthermore, might these practitioners also view a key aspect of professional identity to be active engagement with the democratic, emancipatory discourses and principles falling under the 'identity and voice' lens?

An exploration of links between perceptions of professional identity and professional learning needs and directions warrants further consideration. The netnographic 3-lens model would be valuable focussing device and discussion prompt to spur dialogue and gauge views on the relevance of the 3 lenses to FE teachers' professionalism. My intention was to explore issues of professional identity and values during 1-1 interviews and focus groups as potential key purposes of education. This could be done as a natural part of the member checking of findings.

Getting the Right People into the Room

Access to a suitable participant sample was a significant consideration for the interviews and focus groups, not concerning access permissions, given the voluntary nature of participation, but certainly regarding practicality. This thesis takes the form of an investigation into limited phenomena, not seeking to develop a metanarrative or to derive generalisable theory (Coe et al, 2017:2) but it was important to involve a sample of informal educators' community participants as representative of both the sector workforce and the online forums as possible. I aimed to involve over 20 online community participants including founders, moderators, discussion leaders, regular and occasional contributors, 'lurkers' (who viewed dialogues but did not participate) and those who had knowledge of the communities but elected, as yet, not to participate.

Interview subjects were contacted and invited to participate via messages on the Twitter community forums examined in the netnographic activity. Key individuals such as founders, moderators and dialogue leaders were asked to post parallel messages to reach out to potential interviewees in hard-to-reach groups, in the case of this research 'lurkers' and those who had knowledge of the communities but did not yet participate. The focus groups were each undertaken at 2 larger networking events, an educators' conference and a practitioner researchers' 'research meet' respectively; all focus group contributors had participated in educators' online communities. The fact that the focus group participants came together naturally at 2 professional networking events meant that they organised organically around common interest rather than their meeting being orchestrated.

Are We Clear? Framing and Validating of Questions

As contributors were all professional peers, considerations of asymmetrical power dynamics did not appear to significantly come into play, but an awareness that the interviewer can determine the agenda is required. Short, jargon-free, open questions were drafted and Twitter vignettes in the form of thread summaries were selected to illustrate the topics falling under each of the lenses. Vignettes were used to encourage participants to 'give their own reactions' to representative dialogues from each lens (Hurworth, 2012 in Cohen, Manion & Morrison, 2017:242).

The methodology chapter noted that Kozinets (2010) suggests formulation of initial, central research questions which may be modified as the work progresses. Before piloting the interview and focus

group questions I reflected on the suitability of the initial phrasing of question 3 'How can educators seek to capture any impact from informal online learning opportunities?' and, after discussions with my supervisor, decided that '**What evidence do educators report of any formal recognition of impact from informal online learning opportunities?**' was a more open, appropriate and less leading positing of the question.

Following this minor amendment, the draft interview and focus group questions and vignettes were piloted with 3 interviewees and their comments were invited on question and vignette suitability and clarity. The educators were also asked about flow and order of the questions with regard to any potential order bias and question phrasing with respect to researcher bias. Reviewers commented that questions were clear and well-phrased, providing overarching guidance without inviting simplistic responses; vignettes were considered useful in providing an authentic flavour of the Twitter dialogues. The guiding prompt questions with amendments made following the netnographic analysis can be found in Appendix 6.

The aim of the 1-1 interviews and focus groups was to ask participants to respond to research question 1: **'How do FE teachers who participate in online educators' networks consider that they are engaging in meaningful professional learning?'** and question 3: '**What evidence do educators report of any formal recognition of impact from informal online learning opportunities?**' As 3 educators who held leadership and management roles also were included in the sample, there was further potential to gather responses relevant to research question 2, **'In what ways would the topics addressed during dialogues in online educators' networks be regarded as key development areas for FE teachers by recognised sector bodies?'** from these participants.

Interviewees and Discussants Reflecting the Diversity of the Sector

The choice of interview subjects had been drawn from the volunteers who nominated themselves from the Twitter 'call out' on the educators' communities; all subjects worked in FE, 2 with leadership and management roles running in parallel with teaching commitments. The focus group composition was not in my behest as both were conducted as part of 2 larger educators' gatherings, one in the North-East of England, one in the Midlands; that said, all contributors were working in FE as teachers or teacher trainers, 1 with leadership responsibility. The twelve 1-1 interviews and two focus groups (comprising 6 and 8 educators respectively) allowed engagement with 26 practitioners whose experience in FE ranged from 3 months to over 25 years.

Table 3 below provides a summary of the interview and focus group work, outlining participation details, the duration of events and the methods of data capture employed:

	Focus group 1
Location and type of event	Face-to-face discussion at FE teachers' non-accredited CPD event (University in the Midlands)
Number of people present	6
Number of people actively participating	6
Gender (self-identified)	3 F : 3 M
Age	28 – 52 years old
Methods of data capture	Recording of discussion (audio only, with informed, written consent from all participants) Anonymised event joining information (with permission from all participants)
Duration of recorded focus group event	35 minutes, time-stamped at each question

	Focus group 2
Location and type of event	Face-to-face discussion at FE teachers' conference (University in North-west England)
Number of people present	8
Number of people actively participating	8
Gender (self-identified)	3 F : 5 M
Age	24 – 62 years old
Methods of data capture	Recording of discussion (audio only, with informed, written consent from all participants) Anonymised event joining information (with permission from all participants)
Duration of recorded focus group event	45 minutes, time-stamped at each question
	1-1 interviews
Location and type of event	2 face-to-face interviews in location of participant's' choice 10 Skype interviews (video and audio used for communication)
Number of people participating	12
Gender (self-identified)	8 F : 4 M
Age	29 – 59 years old
Methods of data capture	Recording of discussion (with informed, signed written consent from all participants) Self-reported personal/role profile details obtained from all participants)
Duration of recorded 1-1 interview events	35 minutes – 90 minutes time-stamped at each question

Table 3: Summary of 1-1 interview and focus group participation

Both of the focus groups and 2 of the 1-1 interviews were conducted face-to-face and the remainder of the 1-1 interviews were facilitated via Skype, allowing visual and verbal cues to be gathered from all events. Research participants chose the location, day, time and method of participation for the events in order to minimise reactivity effects and all participants agreed to the recording of their participation. From a personal perspective, the availability of recordings allowed a far more relaxed and focussed event than would have been possible if note taking had been required to capture contributions.

The gender mix of participants in interviews and focus groups was approximately even (54%:46% F/M). Contributor ages ranged from mid-twenties to over 60 years of age and the geographical distribution of practice ranged from the far south west of England to the far northwest of the country. Subject specialisms included teacher education, business management, Functional Skills, politics, uniformed services, HR, leisure learning in adult and community settings, health and social care, travel and tourism, construction, social sciences, information technology, biology, Apprenticeship provision, ESOL and modern foreign languages. Three participants had leadership and management responsibility alongside teaching commitments, 2 of whom were engaged in senior curriculum leadership roles.

At the outset of both focus groups and all interviews, participants were asked to provide a brief outline of their level of participation in informal Twitter communities for FE educators. A minority of participants had been using online educators' communities for professional learning dialogues for 5

years or more, the majority for between 1 and 3 years. One participant had only been engaging with informal online communities for 3 weeks when interviewed. The majority of participants described themselves as actively engaged in 1 or more communities while 3 educators participated in 3 or more online communities. One interview participant 'lurked' on the forums of 2 communities and 1 focus group contributor had seen dialogues demonstrated and hoped to participate but found the interface and protocols of Twitter deterred her from contribution beyond 'liking' posts of others. Significantly, 2 participants had been instrumental in founding, and were continuing to act as moderators for, 2 online communities. These interviewees were chosen on a critical case basis being in key positions to be knowledgeable about community inception, evolution and oversight challenges. An overview of the characteristics, job roles and online community participation profiles of the 1-1 interview and focus group participants can be found in the summary in Table 4.

Overview of 1-1 interview and focus group participants' job roles / Twitter participation	
Total participant numbers	26
1-1 interview participant numbers	12
Focus group participant numbers	8 people (focus group 1 – in North West England) 6 people (focus group 2 – in the Midlands)
Gender mix	54% : 46% F/M
Age range	24 – 67 years
Experience in FE sector	3 months – 25 years +
Job role	3 leaders/managers 6 teacher trainers 26 teachers/trainers - in full time or fractional role
FE subject specialisms	Teacher Education Practitioner CPD Business Management Functional Skills Politics Uniformed Services HR Leisure learning in Adult and Community Education Health and Social Care Travel and Tourism Construction Social Sciences and Education Information Technology / Learning Technology Biology Apprenticeship provision (Engineering and Business) ESOL Modern Foreign Languages
Duration of participation in online communities	3 weeks – 8 years
Nature of Twitter community participation	2 community founders/moderators 3 contributors to at least 3 Twitter communities 19 contributors to at least 1 Twitter community 2 'lurkers' (viewing or using but not posting or 'liking' online content)

Table 4*:* Characteristics and Roles of 1-1 interview and focus group participants

Abridged transcripts (Krueger & Casey, 2015:149) were produced from the digital audio recordings of the focus groups and 1-1 interviews, to yield a textual, verbatim record of 'relevant and useful portions of the discussion' omitting introductions and moderator input. A 3-pass transcription strategy was employed which involved me listening to the full recordings of all interviews and focus groups in the 'first pass', to log question timings, note outline topics and remind myself of the overall sense of each event. On the second pass, relevant segments were transcribed verbatim and a final pass was then used for checking for completeness and transcription accuracy. Krueger & Casey (ibid:149) note that this less time-consuming abridged transcription method may only be used by 'someone who thoroughly understands the purpose of the study… preferably the analyst'.

Table 5 below documents the relative word counts of the transcripts produced:

Data source	Transcript length
Focus group 1	1,272 words
Focus group 2	1,578 words
Interview 1	795 words
Interview 2	1043 words
Interview 3	889 words
Interview 4	521 words
Interview 5	944 words
Interview 6	1012 words
Interview 7	784 words
Interview 8	821 words
Interview 9	1123 words
Interview 10	468 words
Interview 11	773 words
Interview 12	911 words

Table 5: Relative word length log of interview and focus group abridged transcripts

A 'classic… low-tech analysis approach' was adopted to the analysis of the almost 13,000 words of transcripts which Krueger & Casey (ibid:151) note is not 'sophisticated… but it works'. Each data source was allocated a numerical signifier; colour-coded paper copies were printed then cut up into individual statements, typically of 1-3 paragraphs in length. The statement 'strips' were laid out on the floor of a room and reviewed; codes such as 'teacher isolation', 'professional identity' and 'agency' were written on each excerpt. Excerpts were then grouped thematically, in a process 'starting with the specifics and working towards bigger themes' (ibid: 155). Once significant interview and focus group themes had been identified, verbatim dialogue excerpts which conveyed these themes were chosen for inclusion in this chapter (Denscombe, 2017) and an engaging way to render educators' authentic voices needed to be found.

When is a Tweet Not a Tweet? Rendering Excerpts Meaningfully

Though reporting of the analysis of interview and focus group outcomes is possible using the researchers' own narrative augmented with selected keywords, Corden and Sainsbury (2006: 11) note that use of verbatim quotes from participants is valuable in providing evidence of data interpretation, allowing readers to judge the 'fairness and accuracy of the analysis'. Quotes have further explanatory potential around how 'people make sense of their own lives' and, importantly,

spoken words can relay the 'strength of [participants'] views or the depth of feelings… in ways that the researcher's own narrative could not' (ibid:12).

The most powerful rationale for including verbatim quotes from my perspective is to give research participants a voice, an affordance which should be a 'priority for the researcher working within a participatory paradigm' (ibid: 13). Verbatim quotes can be empowering, allowing participants to 'speak for themselves' and can be seen as a way of 'demonstrating the value' of what is said. I join Corden and Sainsbury in challenging the 'use of the very term 'quotation'' as it brings with it the 'implied assumption of the extent to which power and choice' sits with the researcher (ibid:13) and personally prefer the description dialogue excerpts.

A whole or partial Tweet may be traced back to the author with use of a search engine, revealing the author's identity. For this reason alone, verbatim quoting of entire tweets, excerpts or bricolage interpretations were rejected as methods of representing the teaches' voice when exploring netnographic research outcomes. In order to convey teachers' authentic voices during this thesis, verbatim excerpts obtained with informed consent from focus groups and interview participants had to be rendered in an engaging and meaningful way, providing useful contextual information for the reader while addressing ethical issues of anonymity.

The process adopted is perhaps best illustrated with an example of how a dialogue excerpt was rendered during the analysis which follows later in the thesis. An example of an unabridged original, dialogue excerpt is:

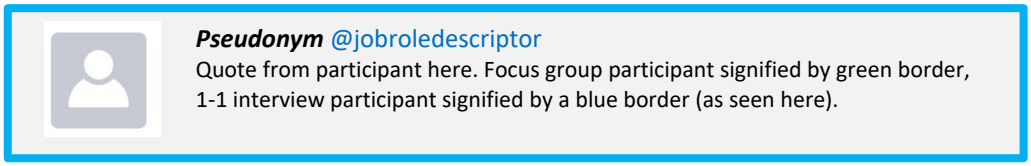
> Interviewee #7:
> No wonder people don't attend it. Mandatory CPD that happens here at [name of organisation was stated here in the transcript but has been removed], I've really kicked against it myself. Do I really need to go through another poorly designed online health and safety module or sit for hours in a safeguarding course when I have far more valuable professional conversations to engage in? We resent it in FE when the in-house CPD is so lacking in imagination and the key people aren't there to inspire people to attend. No wonder people don't attend. Those putting it on are not deeply knowledgeable about teaching and learning.

Removing the identifying organisation name, repetitions and a digression around the exact nature of uninspiring CPD leaves a vignette (in italic script below) which it is hoped has high clarity, renders key meanings and emphases and allows the participants' voice to be heard. The preamble to this excerpt (which can be seen in situ on page 93 of this thesis) also conveys some key words from the full excerpt which were removed for brevity:

> Though managers are singled out for criticism by other interview and focus group participants for a lack of understanding of teachers' learning needs, leaders share the frustrations expressed by teachers regarding the scope and quality of some mandatory CPD offers. In-house CPD is described by 1 manager as sometimes being 'so poor' and another as 'so lacking in imagination', unable able to 'inspire' educators. Managers question the conventional CPD curriculum and the focus, skills and professional currency of those facilitating it:
>
> *"No wonder people don't attend [mandatory CPD], I've really kicked against it myself. Do I really need to go through another poorly designed… course when I have far more valuable professional conversations to engage in? Those putting [CPD] on are not deeply knowledgeable about teaching and learning."*

The next consideration was the formatting of the chosen dialogue excerpts. I elected to render significant quotes from interviews and focus groups, as 'fake tweets', with the term 'fake' used here to signify the fabrication of an original presentation format, not the words being rendered . This new presentation format for edited, verbatim quotes was devised in the hope of providing an engaging visual experience for the reader while allowing use of signifiers enabling easy comparisons of participants and their roles (Coe et al, 2017). Signifiers employed imitation Twitter identities such as 'Julia @TeacherEducator2', a first-name only pseudonym followed by a fake Twitter 'handle' conveying participants' job or Twitter role as appropriate. Each signifier also employed a Creative Commons-licensed avatar (from Shareicon.net, 2019). These thumbnail 'portraits', a common device used by Twitter participants, were chosen so as not to convey any sense of contributors' physical likenesses.

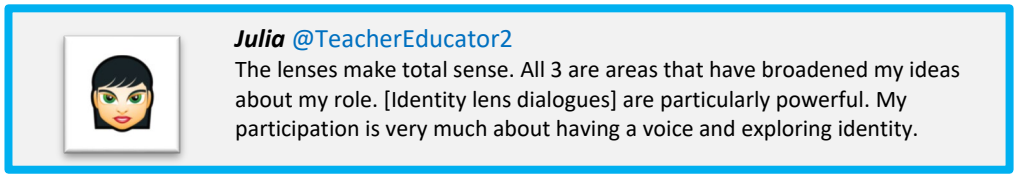
'Fake Tweets' allowed a significant amount of information to be conveyed while preserving contributors' anonymity. Importantly, the device nodded towards the original reason for the participants' inclusion in interviews and focus groups, their engagement with Twitter-based communities. The 'fake tweets' take the form shown below, a green border signifying that the quote is from a focus group participant, a blue border indicating the excerpt is from an interview:

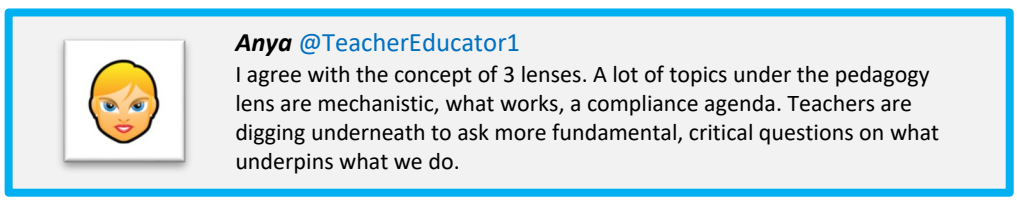


Member Checking the 3 Lens Model

When conveying the outcomes of the 1-1 interviews and focus groups it was essential to begin with participants' comments on the validity of the 3-lens model and on the communities chosen for the netnographic study, factors which underpinned all work done to that point. Absence of resonance of the model or community choice would have necessitated a significant review of work done.

Member checks revealed that all educators contributing to interviews and focus groups consider that the communities chosen were appropriate for FE educators and it was notable that all participants had participated in or viewed at least 1 of the communities investigated in the netnographic analysis. Participants regard the 3-lens model as a useful representation of their understanding of community dialogue themes and a useful frame for discussion:





Rhys @CurriculumLeader1
The 3 lenses stand up… they're worthwhile. We're asking, 'what is there here to learn? in a relaxed setting. What am I seeing, what does it mean, how does this fit with what I already know, my identity?

Rationale for Dialogue: This Is Who We Are, What We Want

The Twitter community founders' rationales on why there was a need for informal online dialogues was revealing. Founders speak of a need for an 'alternative space' for 'proactive' dialogues on professionalism to 'rekindle a whole debate' that teachers are no longer encouraged to undertake. Community founders comments further reinforce the validity of the identity and voice lens:

Theo @FounderModerator2
[Dialogue participation] is about asking, 'who are we?', saying 'this is what we want'.
A notion of linking up and organising outside the institution with some utopian ideas of what FE might be. It's about who defines what we do, our fundamental identity.

Of particular significance is the evidence of strong feelings engendered when teachers speak about their practice, evidenced by 1 educator's reference to 'revolutionary work'. Participation in professional learning is an emotive subject. Though the concept of the identity and voice lens dialogues seemed useful to stimulate discussion, discourse aims were problematic and contested. One contributor notes that her online community contributions deliberately focus on the first 2 lenses, 'not the political'. She states that 'the last thing' she would do is to post a 'political comment', for example challenging Government policy or organisational strategy. She acknowledges this stance as being a personal decision and considers that there is much useful community dialogue around how educators can 'rise up to the challenge' of changing the sector. Another interview contributor disagrees, holding that online dialogues encourage teachers in a 'fragmented workforce' to be 'more active politically, that's what they are there for'.

Another emerging theme concerned the high levels of awareness and strong opinions that participating FE professionals hold on what their professional learning should 'look like'. The Commission on Adult Vocational Teaching and Learning (CAVTL, 2013:2014) places a firm focus on 'dual professionalism' and 'clear line of sight to the workplace'. Participants consider that formal CPD agendas endorse this stance. Contributors with significant experience in other sectors note that teachers are 'well aware' of alternative approaches to CPD employed outside FE. CAVTL (2013:2) itself encourages educators to keep fully abreast of industry standards and practices in their specialisms, to hold an awareness of how industries can 'do things better'.

Considerable dissatisfaction and frustration is expressed with the focus of the current formal professional learning agenda in FE and the lack of time made available for engagement in career-long learning. Words chosen as practitioners speak about mandated professional learning are 'tick-box', 'silo mentality', 'lip service', 'instrumentalist', 'context-free' and 'compliance-focussed'. The detrimental effect of adversarial sector competition, the resulting lack of collegiality and the shortage of inter-organisation learning dialogues in FE are prevalent themes. Two participants speak of their experience in the healthcare and hospitality industries and a third on professional development undertaken for travel and tourism within and outside the UK, noting that:

Howard @ITPManagerTrainer
There are precedents…[in industry] that developmental dialogues are instigated and performed between colleagues in different organisations using the professionals' own agency. Competition means these dialogues have stalled in FE.

Jose @CurriculumLeader2
We need to form local and wider peer support networks commonplace in Europe including subject-specific specialist dialogues. These were in place regionally here in the UK but now no longer exist due to cuts and the competitive climate in the sector.

Shana @ACLTutor1
Teaching can be very isolating, there's so much daft competition which stops teachers sharing what they do. There's no longer so many social communities, even though we are all after the same thing, the best for our students.

Community founders echo the comments of participants regarding the timely evolution of informal online learning communities for educators. Founders see a need for practitioners to organise around social democratic ideals to stand up against the 'hollowing out of FE', by articulating what they want and need in CPD as well as developments which they oppose:

Theo @FounderModerator2
There was a need for an alternative space for dialogues on pedagogy and teacher professionalism… a whole debate that we're not getting involved with… rather than just reacting to things we don't like. Saying 'this is what we want'.

Professional Growth Stalled by Instability and 'Innovation'

The 'churn' of FE professional standards and bodies with sector oversight is highlighted as a tension by interview participants, 1 of whom criticises the regular 'reinventions' of professional organisations. Another notes that managers and leaders see informal online groups as 'a bit of a threat' as their dialogues 'allow people to circumvent' a management agenda of 'institutional narrowing'.

One participant who has worked in the sector for 2 decades expresses feelings of 'dismay' regarding the contrast between what FE has achieved in the past and what it is now. Two other teachers speak of a need for practitioners to be 'more tactical' when 'bombarded' with words like 'innovative', 'progressive' or 'creative'. A community founder highlights a need for teachers to raise a 'collective voice' questioning the credibility of initiatives imposed from outside the sector by those who 'have no idea' about how their desired outcomes can be actioned in a practical sense:

Theo @FounderModerator2
Professional competence is being taken away by the removal of all complexity.
How do we navigate the narrow ridge between compliance and a feeling that we have lost the battle with management who do not know what goes on in a classroom and can't teach?
It's just bonkers.

Exploring Pre-requisites for Meaningful Professional Learning

Educators speak of wishing to exercise agency and operate in a climate of trust regarding their professional identity and learning, to pursue challenging aims during contextualised CPD based on needs, values and identity. The current highly competitive FE environment is identified as a significant barrier, its ethos being an anti-democratic one. A disconnect between 'what teachers need' from professional learning and 'what we have' is articulated and indications emerge that informal learning helps to bridge a needs gap. One educator notes that teachers need to be 'sharing and learning from each other' and comments that before the advent of informal communities 'there was nothing specific online for FE teachers'.

A need for mutual trust and an ethos of equity in learning dialogues are also common themes. One teacher notes that we need to operate in a climate in which we 'trust that teachers want to improve performance and do a good job' and allow them to exercise agency to engage in self-selected developmental dialogues. Another agrees that peer dialogues are preferable to a 'hierarchical arrangement' noting that it is 'important that there is equity' in teaching and learning conversations, if we are to enable 'meaningful dialogues with challenge'. Comments around the CPD agenda theme include:

Anya @TeacherEducator1
I consider the third lens [identity and voice] 'why I am here'. Life would be much simpler if we didn't question the [CPD] agenda, but I question everything, the provenance of the information, the intent.

Edward @WorkBasedTutor1
Teachers need to engage in co-creation of their CPD programmes and have control over the direction based on their own values.
Dialogues with peers… provide the steer.

A significant benefit of informal online communities noted by 3 interview participants is that teachers can set the agenda for professional learning and access their desired CPD theme 'on demand', at a time of their own choosing:

Rosa @HEinFETeacher2
You do it [CPD] at a time when you need it, you go and seek out dialogues. Given how busy teachers are, I think CPD is done less because it's less fun and enjoyable now. Topics come up [online] and I think 'yes, that's really interesting'. I skim the topics being covered most days then just follow the discussions that are relevant.

…and What Teachers Have in its Stead

A significant majority of participating educators are critical of what they perceive to be the instrumentalist, performative climate in FE. The lack of relevance of the CPD offer to tutors is an issue repeatedly raised. The prevalent environment impacts upon educators' ability to exercise agency and tailor their own CPD programmes. The unwelcome trend for generic CPD programmes which fail to meet teachers' specialised learning needs is singled out for particular criticism. Teachers report that they wish to engage in conversations on 'what makes

good learning' on 'effective pedagogy in of itself' but instead are asked to regard their practice as 'simply one factor' in gaining a favourable Ofsted inspection judgement:

Rhys @CurriculumLeader1
[We work in a] …Trip Advisor world whose focus is on grading on a star system, on judgement rather than on development. I want reciprocal, collegiate professional learning, challenging and frank but working on democratic principles.

Anya @TeacherEducator1
We're having a compliance agenda which does not meet our professional learning needs visited on us. We have teacher training, not education… this falls short of giving the opportunity to ask challenging questions.

Howard @ITPManagerTrainer
We work in a tick-box, compliance culture where we have to embed A, B and C into our practice. Informal communities meet a need for us to move away from this and set our own CPD agendas.

What Informal Online Communities Bring to the Party

Educators voice appreciation for the added value that informal communities bring to CPD, either via direct dialogue or by signposting to development opportunities. Participation in a wider community, a reduction in isolation and an escape from a sense of being trapped in organisational thinking are listed as significant factors in informal online communities' appeal. Words such as 'mobilise' and 'organise' and talk of maintaining 'buoyancy' are used to describe the purposes and actions of community dialogues. A community founder /moderator speaks to the need for alternative forms of professional learning beyond a performativity focus, calling on democratic ideals and the need for a 'sense of self' to help teachers 'circumvent' inappropriate organisational CPD agendas:

Theo @FounderModerator2
Language around CPD in institutions is a very narrow notion. The banality of stretch and challenge, British Values, instead of you, in the classroom improving your practice. I need to ask how my practice… enables wider society. People are reclaiming professionality, asking [of managers] 'who are these people making decisions about who I am and what I do?'

Tensions around the focus of mandated CPD and the alternative learning dialogues offered by online communities is a recurring theme, summed up by an educators' comments on professional identity and purpose conflicts and need for paradigm 'subversion':

Anya @TeacherEducator1
We are subverting the dominant paradigm with informal learning. People going into teaching really do want to make a difference in people's lives not just give them pieces of paper… to empower, help the next generation. What are the attitudes you need to succeed as, say, a plumber, what is your professional identity? That's not in the assessment criteria but it's the most important learning."

No Teacher Should Be an Island

Several teachers speak of the frustrations of working in organisations which adopt a 'silo mentality' where innovations in practice or experimental CPD are frowned upon or where 'gatekeepers' restrict access to or funding for CPD. Online communities are considered valuable tools for removing barriers to CPD and building or extending alternative networks:

Fran @FESTEMTeacher
There doesn't seem to be an appetite for trying new strategies [in my organisation] we keep having the same conversations. Online networks allow me to turn outwards and have exposure to new ideas.

Anya @TeacherEducator1
If you're the only person asking critical questions [in the organisation] then you try to link up with others who do the same. It can be a desert out there, so we're lucky to be in an era where we can connect and that's what Twitter is brilliant at.

Rosa @HEinFETeacher2
At work I'm an island, it is only me [in the job role]. How else will I find out about new things when I'm not senior enough for them to pay for me to go to a conference? I'm not getting challenging conversations at work. I might if I went wider outside, so this is my opportunity to network.

Never Mind the Community, What About the Impact?

Testimonials of tangible professional learning emerge as a result of online community participation including these examples from an experienced practitioner and forum founder and a new FE teacher who has recently begun participating in online communities:

Shana @ACLTutor1
I thought, "I've written [in the press] about use of mobile phones therefore I'm right". I came to the discussion with very clear ideas. Everyone said I was coming at it from the wrong place and needed to use phones as a supportive tool… now I use them in my classes. [Twitter dialogues] made me challenge my opinions and give me practical ideas of how I could use new strategies.

Lauren @FEPersonalTutor1
I've only been joining forum chats for 2 weeks but in my first week I was signposted to a tool for online image curation from an expert at Jisc. I had asked around at work and with my other contacts, but my first online chat got me a technology solution and some great practical examples of how I could use it.

Several educators relate to the supportively challenging structure of informal dialogues which are described as 'hierarchy-free'; 3 teachers comment that they have frequently experienced college principals chatting 'as equals' with brand new teachers online. 'Robust discussions' are held where opinions are challenged during peer learning dialogues. A community founder/moderator comments that 'barriers are broken down' in open dialogues:

Stella @FounderModerator1
Principals tell me they use forums to get a better understanding of real life, not the 'Disney version'. I think my voice is just as valid as a CEO's. It's much more restrictive at ground level as everyone wants to impress their boss.

Significantly, all but 1 of the interview and focus group participants note that they had not formally recognised online learning dialogues. One comments, 'I might tell my manager some outcomes' but she notes that she does not know of anyone who would say 'this is my CPD'. That said, 1 educator considers that she is 'part of a movement' to bring online dialogue outcomes into formal CPD conversations by disseminating them at her organisation's CPD events. She describes this action as 'a bit subversive' and, importantly, holds that she would not 'make explicit' that the roots of formal CPD activities or resources 'trace back' to online communities.

Voices of the FE Managers on Shortfalls in Mandatory CPD

Four FE leaders with significant oversight responsibilities at Vice Principal/Faculty Head level participated in the interviews. All have roles in staff recruitment, development and programme quality in addition to teaching responsibilities.

Though managers are singled out for criticism by other interview and focus group participants for a lack of understanding of teachers' learning needs, leaders share the frustrations expressed by teachers regarding the scope and quality of some mandatory CPD offers. In-house CPD is described by 1 manager as sometimes being 'so poor' and another as 'so lacking in imagination', unable able to 'inspire' educators. Managers question the conventional CPD curriculum and the focus, skills and professional currency of those facilitating it:

Keith @CurriculumManager1
No wonder people don't attend [mandatory CPD], I've really kicked against it myself. Do I really need to go through another poorly designed… course when I have far more valuable professional conversations to engage in? Those putting [CPD] on are not deeply knowledgeable about teaching and learning.

Phil @HEinFELeader1
We need to build quality teaching… but we're distracted by achieving compliance. Quality teaching can only be done by engaging in a collaborative process but teachers and managers don't seem to agree on what the core purpose of teaching actually is.

Managers seem to have a clear vision for what teachers' professional learning should 'look like' and this resonates with many comments made by teachers on their CPD:

Keith @CurriculumManager1
We should be sitting down with teams and asking, 'what do you want to do?' for CPD rather than arranging another round of isolated compliance sessions.

Phil @HEinFELeader1
Teachers need to build their own narratives which are not focussed on a recipe to achieve a set of outcomes… to take experiences away from CPD dialogues and contextualise them.

No Silver Bullet Waiting Online

Informal online discourses were critically appraised by the FE managers, 1 describes online community dialogues as 'all about autonomy and agency' another as 'thought-provoking' and 'innovative'. Another leader prizes the networking and information- and resource-sharing value of community participation, having used the online communities for CPD herself:

Beverley @ITEManager1
I've met many people and been introduced to information I wouldn't have found otherwise and that's great. They [online communities] are wonderful for getting answers to questions or signposting help if there's nobody else.

That said, all 4 managers view the online communities as only a springboard to agentic professional learning, a 'beginning', not an end in itself. One manager describes the dialogues as 'pre-praxis' in provision of 'virtual help' but notes that dialogues are most often 'technicist'. Others posit that deeper, more complex professional dialogues must follow if meaningful professional learning is to occur:

Keith @CurriculumManager1
[Informal online learning] is accidental, messy… something… which can then be formalised. It's a signposting to more formalised, purposeful, professional conversations. Someone says something online and you think 'I need to find out more about that'.

Beverley @ITEManager1
The problem comes when we confuse 240-character tweets for genuine professional dialogue. What they [informal online communities] do well is networking… but it's not a substitute for sustained professional dialogue.

Two managers comment that they felt that informal online dialogues are unlikely to be reaching a 'new audience' of educators, participating in CPD online while eschewing other opportunities elsewhere, a typical comment on this theme being:

Beverley @ITEManager1
I don't think you are reaching a new audience who've not done CPD who are starting to do it for the first time online. It's a similar group of people who are active networkers in their own organisations. They've found new networks where they can have a say in the CPD agenda more than in their organisation.

One tangible example only emerges from discussions with managers of online forums being used in a more formal manner by FE college leadership. This was provided by a forum founder who also highlights some FE managers' lack of awareness of the value of informal online dialogues:

Stella @FounderModerator1
I know of 1 [leader] who uses each week's chat as a basis to explore topics with staff in weekly CPD. A lot of people at senior levels don't know what online communities are or what they do. A manager told me '*Why on earth would I go on Twitter, I'm not interested in what people had for breakfast!*'. They [management] have no idea and are not open to experimenting with CPD or different ways of learning.

Out of the Frying Pan…?

Educators take a balanced view of the impacts of informal online learning, one describing a 'love-hate' relationship with community discussions. Though forums are described as 'powerful networking tools' by a teacher who felt isolated in fragmented FE provision, dialogues are viewed in a critical light. Online interactions may be necessary in the current FE climate, but limitations and tensions are evident.

One interview participant, a teachers' Twitter community 'lurker', questions the legitimacy of any online dialogue in which contributors are unsure of the identity of the authors of messages. Twitter algorithms prioritise presentation of messages which gain most 'likes' and the interviewee also questions the motives behind 'liking' a post in a community dialogue:

Leonie @FETeacherLurker1
When people like a tweet you don't know the basis for why that was or even who they are. You can say whatever you like and it can't be checked. People talk a very good talk but what does it mean? If 20 of us said 'this is the strategy to use' we might not have used it but it could become a new standard. That's 1 reason I'm not ready to come out [stop lurking] yet.

Other participants echo the FE managers' opinions that the Twitter dialogues are a useful starting point for CPD, conducted in a 'relaxed setting', but are dialectics which needed to be consolidated in organisational teaching teams. Outcomes from online dialogues are described as a signposting only, 'needing to be formalised', to be more purposeful. Contributors also express concerns that those fleeing restricted in-house dialogues may find themselves in a different silo, albeit a digital one:

Julia @TeacherEducator2
I'm online to get out of a silo. I've made all of these different connections, still there's so many people in my organisation who won't go near social media at all, never mind Twitter - certainly not for professional reasons. There's only certain identities, certain voices there, I've been reminded of that by some things that have been said.

Behave Yourself! Challenging Conduct Displayed by Teachers

Community moderators report some challenges which have been encountered when mediating community dialogues. Strong opinions and 'passions' are expressed by teachers regarding their

practice and working environments, so there is sometimes a need to reinforce the need for respectful dialogue:

Stella @FounderModerator1
You need to set a tone…. chats can get out of hand. I don't care how much you think you know, you don't get to talk to people [rudely]. I intervene, in a humorous way, if they [participants] defy group expectations that everyone is welcoming. I learn more when there are strong differences of opinion, but teachers are supposed to be role models.

Another founder-moderator notes that educators' Twitter dialogues may become acrimonious because of the relative anonymity afforded by online, avatar-based identity and dialogue brevity, factors which can discourage nuanced discussion. Dialogues may also, he notes, be monopolised by the 'dominant voices of a few dozen people'. Despite commenting that teachers' online community discussions are valuable for development of pedagogy and provision of support, he remains 'pessimistic' regarding how communities might influence education policy or 'political understanding of FE' in order to shape policy.

Educators' communities are viewed as a sub-culture, sometimes a challenging niche one. Participants note that there are many, diverse 'post-16 voices' contributing to online dialogues. Individuals define themselves in quite different ways which, one contributor proposes, can be 'divisive politically'. One participant describes online dialogues as mirroring existing segregations in a fragmented educational landscape, 'I'm in FE, you're in an academy… so you do this'. Another notes that dialogues can be valuable in encouraging recognition of common FE challenges, but stated:

Julia @TeacherEducator2
Just as people might misbehave offline they do online, too, you get some boisterous almost 'mansplaining' type of behaviour, so there's only a certain type of people that will be there [in online communities]. There's a whole range of other people in the sector who'll never venture into these spaces, so in itself it's a type of silo.

The same interviewee recounts 2 challenging situations which crossed the boundary from Twitter to alternative 1-1 dialogue forms. When challenged about an online comment she had made, she recalls that she elected to 'take it offline', telling her challenger that she would reply by email as they were 'completely misinterpreting' her views. After an email exchange, the tone 'calmed down'. On another occasion, she considered that a 'powerful person' was 'using his intellectualism' to dominate a dialogue. After challenging this behaviour openly on Twitter, she recounts that she 'woke up to 10 private messages' intended to clarify his meaning, a behaviour she described as 'interesting'. She notes that the interaction was 'sorted out very professionally… we agreed on some points, not on others'. Significantly, from a power dynamic perspective, she described online dialogues evocatively as an 'arena' which is stepped into:

Julia @TeacherEducator2
It's like going to a party where you don't know anyone and you have no idea how anyone's going to behave. Stepping into that arena, some people will not want to be involved in that. I think that would definitely put some people off, but not me, I just roll my sleeves up.

Challenging behaviours such as those detailed in the incident outlined above and a 'rant' witnessed by another interviewee are in a minority of problematic interactions reported, but it is noted that

challenge may deter some educators from participating in online communities. Some teachers purposefully elect to limit online community participation (if observation can be called participation), using information and resources but not engaging in dialogue. One 'lurker' explains her rationale; she considers that active community participation may cast her as a 'self-publicist' which does not sit easily:

Leonie @FETeacherLurker1
I definitely lurk and follow. I don't tweet… because it's put out there in the public domain with a lot of unknown people reading it. I would have to think a lot about what went into a permanent, written post. I don't want to go online and say, 'I think you should do this in your classroom because I have'. You are putting yourself out there and saying, 'I'm good at this', and we don't all do that very well.

Summing Up with 3 Vignettes

To close this outline summary of 1-1 interview and focus group outcomes, 3 contributions considered significant to emerging, overarching themes, and indeed the themes of the thesis itself are offered. The first is from a 'lurker' who invites us to question the reasons for the rise in popularity of informal online learning for teachers:

Leonie @FETeacherLurker1
Has informal learning become much bigger and more important because technology has made informal networks easier to access, or has it grown because teachers are finding that informal learning is the best way of developing their practice?

The second comment addresses the issue of low levels of participation in more conventional CPD in FE. An interesting perspective on teachers possibly declaring CPD non-participation as a 'protest' was advanced by a teacher educator:

Anya @TeacherEducator1
We have to ask, 'what do we mean by CPD?' Now you don't have to do your 30 hours, no-one checks. Colleges tell you they have CPD days, but teachers don't have any say in the agenda. Is it about professional learning or how to fill in a form?
Perhaps when teachers say, '*I didn't participate in any CPD'* they may be saying 'I didn't get chance to participate in anything that resulted in professional learning for me'.

To end on a more optimistic note, the power of online communities with respect to educators' representation, activism and voice is promoted by one respondent:

Shana @ACLTutor1
[Because of online teachers' communities] teachers are getting braver and feel like they have a voice and can effect change politically. They have conversations which can allow managers to properly understand how management decisions affect day-to-day life and how this affects students.

‘10 Words’ from Teachers on Informal Online Learning

The final data collection tool is a social network analysis-based activity in which all 1-1 interview and focus group participants were asked to share ’10 words’ which sum up their participation in informal online educators’ communities. The aim of using this think piece was to provide participants with an engaging way of summing up their online community experiences in a relaxed manner once a need to articulate detailed impressions in recorded interviews was removed. Some teachers responded ‘on-the-spot’, others elected to reflect and send 10 words by email or Twitter message.

Eighteen participants engaged with the ‘10 words’ activity. It is of interest whether aggregation of contributions reinforces outcomes from the netnographic analysis, interviews and focus groups. A word cloud generator (WorditOut) was used to create a graphical summary of the words. The result is shown in Figure 3; the size of each word is shown in relative proportion to its popularity.

Figure 3: Word Cloud generated from the ’10 Words’ social network activity

The word cloud provides transparent rendering of the frequency of words chosen by participants giving prevalence to the words collaboration, support, engagement, collegiality, challenge, accessibility, immediacy, peer-leading, sharing and agency. What is notable is the popularity of the word ‘political’ as the fifth equal popularity choice, reinforcing the importance to educators of the ‘identity and voice’ lens.

Some significant motifs emerging from the interviews and focus groups, then, appear to be desire for teacher agency in setting professional learning agendas, rejection of instrumentalist CPD, approval of opportunities for professional learning network growth and the welcoming of the sense of shared identity experienced through participation in online dialogues. These and other significant themes are explored more fully in the analysis chapter of this thesis. The chapter to follow explores how coherently emerging themes chime with the literature reviewed in this thesis and how the themes sit in context in the sector.

Chapter Five
Data Analysis: Consensus and Tensions in Search for Impact

> *'Trust rather to the multitude of arguments than the conclusiveness of any one, [to] a cable whose fibres may be ever so slender, provided they are sufficiently numerous and intimately connected.'*
>
> (Gardner, Holmes and Leitch, on evidence of impact, 2008:98)

The previous chapter examined educators' informal online dialogues using teachers' authentic voices, attempting to do justice to their 'uniqueness and setting' (ibid:93). This chapter builds upon that work, providing a discussion of the '3-lens' model from the netnographic analysis and putting flesh on the bones of the outline summary of interviews and focus groups. It responds to research questions and examines how findings relate to significant themes from literature and to the opening chapter of this thesis which investigated context and climate in FE.

An Appetizer: informal, online learning in 10 words

The 10-word think piece was the final data collection activity undertaken. Though it is ill-advised to draw significant conclusions on the value of online informal learning from 10-word data sets from a small sample, an analysis of the word cloud is offered here as a thought-provoking appetiser, a device to assist in a search for concrete themes. Mixed methods research considers 'multi-various items' of data which can 'cohere into a mutually supportive and therefore arguably credible source' as 'where there is smoke, there is (the potential) for fire' (ibid:97). The '10 words' think-piece activity forms part of the evidence jigsaw and a reminder of Figure 3, the word cloud generated on educators' perceptions of participation in informal online learning, is shown below.

Figure 3: Word Cloud generated from the '10 Words' think piece

Collated responses from the 10-word think piece illustrate that there is some agreement that online, informal communities allow teachers to participate in collaborative, supportive networks. Key words convey that teachers consider that the communities enable 'engaging', 'immediate', 'peer-led' dialogue in a 'collegial' atmosphere. McGivney's (1999) signifiers for successful informal learning include encounters which arise as a direct result of participants' interests, responding to expressed needs. Eraut (2000: 12) adds that 'reactive' informal learning can occur which is explicit and spontaneous, prompted by events and opportunities.

Words such as 'natural', 'evolving' and 'on-demand' used in the 10-word activity speak to attributes of successful informal learning. A tentative conclusion in response to research question 1, **How do FE teachers who participate in online educators' networks consider that they are engaging in meaningful professional learning?** is that valuable informal learning occurs in the Twitter communities. This conclusion is also supported by less frequently employed word choices 'equitable', 'bottom-up', 'hierarchy-free', 'democratic' and 'self-directed' 'practice-sharing' and 'agency'.

Lave and Wenger hold that informal learning involves participants in 'construction of identities' in participative, social situations, such experiential learning being rooted in community values and identity (Wenger, 1999: 4). It is notable that the fourth most popular word employed to describe informal online dialogues is 'political'. Holding equal popularity to 'collegial', use of the term 'political' can be said to be reinforced by the related, lesser used words, 'subversive', 'provocative', 'activism' and 'empowering'.

Though, evidentially, 'where there is smoke, there is (the potential) for fire' (Gardner, Holmes and Leitch, 2008:101), there is also a need to exercise caution. Gathering rain clouds signified by the words 'utopian', 'critical' and 'unquantifiable' reveal tensions and problematise the concept of informal online learning. These words may presage evidence which pours cold water on the value of online community dialogues.

Entrée: Outcomes of the Netnographic Analysis of Community Dialogues

The netnographic activity was the first data collection exercise, its outcomes informing the 1-1 interviews and focus groups. Dialogues can be mapped to 3 lenses, the **pedagogy** lens focussing on development of evidence-informed practice, the **identity and voice lens**, focussed on how teachers define and advocate for their values and the **learning community lens** relating to how teachers connect and support each other. An examination of dialogue focus is valuable in addressing research question 2, **'In what ways would the topics addressed during dialogues in online educators' networks be regarded as key development areas for FE teachers by recognised sector bodies?'**

What Matters Most: Relative Weights of Informal Online Dialogues

Performing a quantitative data analysis (comparing dialogue thread totals) can be criticised for being an incongruously positivist approach, returning to personal realist roots. Cohen, Manion and Morrison (2017:680) pragmatically conclude, however, that in 'real world' data analysis, 'fitness for purpose should be the guide'. An appreciation of where dialogue weightings fell aided my understanding of the discourses. I embraced a brief, initial quantitative approach, mindful of its positivist taste, hoping to reveal ways in which the netnographic findings related to the '10-word' think-piece outcomes.

Wenger (1998, in Kennedy 2005:13) holds that learning communities work on shared challenges, negotiating a 'joint enterprise', exerting control over their agenda. Though simple, quantitative measures are used in this agenda analysis, dialogue weightings reveal teachers' priorities outside a formal CPD agenda. Cormier (2008:3) holds that 'community is the curriculum' during rhizomatic, spontaneous online dialogues. What teachers discuss when exercising agency is a significant measure of what they consider important and what speaks meaningfully to their identity.

An examination of the dialogue weightings by lens reveals that almost half of the informal dialogue threads focussed on **pedagogy**. The next most popular lens in terms of dialogue thread numbers was the **identity and voice lens**, comprising just over a third of online dialogues. The third lens, whose focus fell on **learning communities** encompassed a fifth of the thread themes. Teachers engaging with the 3 communities, then, place the strongest dialogue focus on nurturing knowledge and skills, the technical and practical wisdoms of informed pedagogy. Beyond this, significant identity focus is shown in the 1 third of dialogues falling under the 'identity and voice' lens, suggesting the embracing of values-informed praxis with a lesser yet present focus on building a supportive community. Figure 4 shows a graphical representation of dialogue weightings.

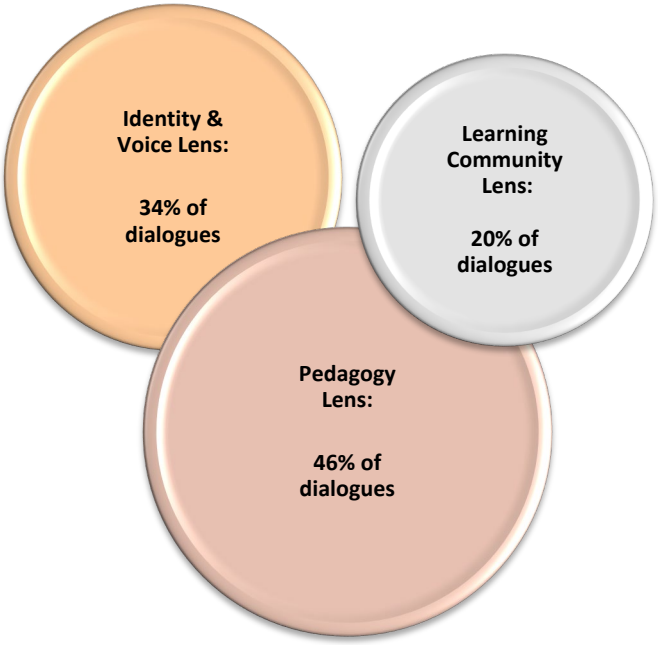


Figure 4: Twitter dialogue threads showing percentage weightings by lens

Interrogating the Dialogues in Greater Depth

A deeper qualitative analysis of the dialogue threads falling under each of the 3 lenses is required to explore what can be revealed about dialogue attributes, topic content and correspondences to the literature considered in this thesis and to the ETF (2014) Professional Standards. The emergence of a 3-lens model for educators' online informal dialogues seems unsurprising considering the popularity of the grouping of three in art, literature and spirituality. Established use of hendiatris, the 'rule of three' in writing signifies that a tripartite grouping is a persuasive way of categorisation, a useful rhetorical device (Forsyth, 2013). Each lens will now be considered in turn beginning with an examination of the lens under which the majority of dialogues fell, the pedagogy lens.

Pedagogy Lens Dialogues: Gathering of Professional Standards Strands

This thesis has been critical of standards-based, 'tick-box' approaches to assessing the quality and impact of CPD, built on the voices of Sennett (2009) Coffield (2015), Scales (2012) and Golding, Brown and Foley (2009) who all call for holistic building of craft versus an assembly approach. That said, it is important to reassure those who may take a more instrumentalist approach to the building of teachers' professional practice that their opinions are considered as a standards-based approach to CPD appears to hold sway (Kennedy, 2005: Sachs, 2003: TDT, 2017). Teachers' CPD is anchored around the use of professional standards. Considerable focus falls upon how 'impact' can be easily and rapidly measured from individual CPD activities which are 'threaded together' into programmes with professional standards as their foundation (Ofsted, 2014:8).

Accommodation of a standards-based approach may be achieved by auditing informal online dialogues against the ETF standards (2014) to establish if they might indeed be 'threaded together' to constitute relevant CPD. Then, we should move on to consider the building of professional practice as an exploratory process, rather than a means-end journey assessed by immediate impacts (Scales, 2012). The pedagogy lens dialogues are summarised in Table 6.

The Pedagogy Lens: 'what we do in evidence-informed practice'

An examination of the pedagogy lens dialogues over the 6-month period reveals that 46% of community dialogues can be regarded as directly related to development of evidence-informed practice, what teachers do in learning spaces and the theoretical underpinning informing that action. Each online community undertook at least 9 dialogues in this area.

Dialogues engage with theories of learning including behaviourism, social constructivism and humanism and explore metacognition, the fostering of creativity and theories related to learning technology use. Competing approaches are critiqued including the value of socially situated learning versus instrumentalism and explorations of motivational theories linked to feedback are undertaken.

Development of the skills embedded in the curriculum are explored in dialogues on development of English, maths, IT, wider digital skills and the evidence-informed use of technology.

The teacher's role and tasks at significant points in the academic year are discussed in dialogues around programme recruitment, entry and exit, induction, parents' events, attendance monitoring, revision and supporting learners during end-of-year exams.

Specific curriculum areas and learner groups including SEND/LDD learners, Access to HE students, STEM, ESOL, Offender Learning and Apprenticeship cohorts are addressed and learners' choices in relation to progression onto other programmes and into employment are considered.

Holistic, cross-curricular issues such as inclusive learning, differentiation, promoting positive behaviours, use of learner role models, effective communication and feedback strategies, learner self-efficacy and resilience and learners' mental health are discussed.

Dialogues around more mundane 'nuts and bolts' of teaching which might be more valuable to new teachers are undertaken such as the writing of a scheme of work, the framing of aims and outcomes and the shape of the 'perfect lesson'.

Table 6: Dialogues under the Pedagogy Lens

Consideration of the pedagogy lens dialogues against the ETF (2014) Professional Standards reveals that dialogue topics can be said to encompass the majority of areas covered by the Standards with respect to the 'professional skills' domain. The professional skills prescribed in standards 13 to 18 encourage teachers to develop skills and expertise in curriculum planning, assessing and giving feedback, motivating learners and developing their self-efficacy, developing maths and English skills and promoting the use of technology. In other standards domains, dialogues around specific learner groups including adult returners, SEND learners, offender learners and ESOL students link to standard 5 in the 'professional values and attributes' domain and to standard 14 in the 'skills' domain which attend to promoting diversity and meeting specific learner's needs.

Dialogues around learning theories and theory-grounded exchanges on fostering creativity and promoting positive behaviours link the online dialogues to standards 4, 8, 9 and 11 in the 'professional knowledge and understanding' domain. Also in this domain, dialogues around the

organisation and facilitation of specific events in the academic year and stages in the learner journey such as induction, examination and progression speak to consideration of standard 12 which addresses the understanding of the teacher's professional roles and responsibilities.

It can be inferred, then, that teachers are using informal online community spaces to engage in dialogues around areas covered by the 11 standards noted above. In addition to this, teachers discuss what works best in their teaching and evaluate their pedagogy and vocational practice against evidence-informed strategies and resources proposed by peers, involving them in work with both ETF (2014) standards 1 and 2. This leads to the positing of a tentative 'yes, there is evidence here' in response to research question 2, **'In what ways would the topics addressed during dialogues in online educators' networks be regarded as key development areas for FE teachers by recognised sector bodies?**

Talking Pedagogy: Unpacking the Theory Toolbox in Search of Wisdom

Dunne (1993: 19) holds that 'atomistic' objectives are worthwhile only if they 'aggregate over time into qualities of mind and character', encouraging reflective thought and enabling the 'really significant achievements of education'. Those advocating an objectives-based curriculum for students or a standards-based CPD model for teacher-learners, risk eliminating the 'hermeneutical dimension' from teaching (ibid:20). Consideration of this dimension encourages a widening of the CPD impact and value analysis to examine dialogues against literature on educational purpose.

Biesta's qualification domain (Gregson et al, 2015:5) considers education's function and purpose as the transmission of knowledge and skills and the development of role-related ability. CPD involves the building of technical reason (techne), the 'knowledge possessed by an expert' in a specialised craft, whether that expert is a carpenter fashioning a table, a doctor restoring a patient's health, or a teacher delivering FE's employability-focussed learning outcomes. Development of technical reason enables a maker to comprehend and articulate the 'why and where, how and with what' of making (poiesis) with 'a final purpose' (telos) (Dunne, 1993:244).

Educators' online pedagogy lens dialogues are rooted in the qualification domain. Teachers build technical reason, seeking to become 'qualified to perform a certain task or job' (ibid:5). By engaging in dialogues around practice, roles throughout the academic year and the tools used to fulfil their roles, teachers build knowledge regarding the 'how and with what' of practice. In pedagogy lens dialogues we witness an initial teacher training curriculum enacted in microcosm, albeit in a more organic, haphazard manner than FE managers planning a formal CPD curriculum for teachers might deem fitting if their focus is on homogenous outputs.

Teachers take macro and micro approaches to 'qualification', examining perennial, year-round challenges and engaging in specific dialogues on annual events. They respond to the 'skills agenda' and link practice to evidence bases by examining educational research. This development of practice relates to short, time-bound events (such as induction periods) and what screenwriters would call a 'longer story arc' of programme-long or progression-related needs (such as building self-efficacy).

Pedagogy lens dialogue topics show teachers seeking to build evidence-informed practice and vocational knowledge, but the roots of these dialogues draw from classroom experimentation and craft and see teachers seeking pragmatic strategies beyond means-end achievement of learning outcomes, examining areas of practice and vocational specialism which require nuanced, situational approaches. Developing functional maths skills in an engaging, contextualised manner, communicating sympathetically and effectively and managing challenging behaviour without

stigmatising learners are typical examples of dialogues addressing the affective domain, involving what Sennett (2009:288) calls 'shared experiment, collective trial and error'.

Teachers, therefore, look beyond the building of theoretical, technical reason rooted in intellect, to work with practical wisdom (phronesis) in the building of praxis. Dunne (1993: 256) contends that practical wisdom cannot be rules- or skills-based, having 'perceptiveness' (aesthesis) as its foundation. Rather than requiring subject mastery, practical wisdom involves 'sensitivity and attunement' to each unique, arising classroom situation requires teachers to be as aware of their own responses as those of their learners. Deleuze (in Foucault, 1977:208) when considering the theory-practice relationship discussed here, describes theory as 'exactly like a box of tools… it must be useful'. Outside purely intellectual exercises, theory is merely a 'relay from one practice to another'. As teaching is no intellectual exercise, but an unpredictable, 'variable process' (Biesta, 2010:10), it is necessary for teachers to work at 'piercing' the wall which untested theory inevitably encounters (Deleuze in Foucault, 1977:208).

It is notable how many pedagogy lens dialogues adopt a case study or solution-focussed approach seeking to pierce the wall of untested, generalised theory in a specific context. Dialogue threads emerging as responses to questions, such as 'how can we get learners to appreciate that maths is relevant?', 'how can I build learners' confidence?' or 'how can I encourage focussed use of mobile phones?' evidence this approach. The sharing of evidence-informed strategies in pedagogy dialogues shows that teachers value experiential dialogues rooted in andragogical thinking, employing task-orientated, problem-centred pedagogy with immediate application (Knowles, 1984). This process casts the teacher as one who seeks to be a 'builder of theory that grows out of practice' (Scales, 2012:1) and values practical wisdom.

Evidence of Dialogue, Certainly – So What?

Critics will rightly point out that the presence of an online dialogue on 'topic X' is not evidence per se of meaningful professional learning occurring. One rebuttal to this criticism is to draw parallels between informal online dialogues and a one-off, face-to-face CPD event. Would the proximity of teachers in a room focussing on an area of practice with a trainer as 'ringmaster' be any more likely to guarantee meaningful professional learning?

It has been established that the dialogues under the pedagogy lens directly relate to the majority of the professional standards. It will fall to the teachers and managers participating in the 1-1 interviews and focus groups to be arbiters of the value of these dialogues. Whether the dialogues are valuable, meaningful aids in the building of practice in the qualification domain will be decided not by mere presence but by their impression on practice. For now, it is useful to conclude that the dialogue topics under the pedagogy lens can be mapped to 11 ETF (2014) standards and linked, by inference, to 2 others as well as exploring development of both technical and practical wisdom. The dialogues join evidence from the 10-word activity as entwined 'fibres' in the 'cable' of evidence for the impact of informal online learning (Gardner, Holmes & Leitch, 2008:98).

Learning Community Dialogues: Enduring and Developing Together

Attention turns now to the threads falling under the learning community lens. Any evidence-informed practice built by participants in Twitter communities is not developed through solitary reflection on engagement with theory but is intentionally undertaken as a part of a wider online community. The dialogues under the learning community lens are summarised below in Table 7.

The Learning Community Lens: 'how we connect and support each other to develop'

The learning community lens had fewer dialogues than the other 2 lenses, 19% of the dialogues in total, but evidence at least 4 active threads per community.

The importance of mentoring, coaching and peer support figure in the dialogues including discussion of how FE mentors might be trained and how teachers seeking support could locate and select a mentor and develop a productive relationship.

Discussions on the trajectory of teachers' professional progress, opportunities for promotion and the raising of professional profiles occur. These dialogues encompass signposting to opportunities for writing for academic journals and discussions of under- and post-graduate research opportunities.

Peer support dialogues extend to how teachers might safeguard their mental health both in day-to-day work and at times of transition and progression. Teachers solicit advice on peers' experiences during significant career- and study-related life changes such as moves into leadership and management roles or academic advancement. Guidance on QTLS and ATS processes, tasks and workloads is also sought by dialogue participants.

Learning community dialogues promote learning opportunities at networking events and discuss outcomes from such events. These dialogues signpost opportunities to attend and disseminate feedback from conferences, formal professional network meetings and community and employer engagement events.

Significantly, in addition to signposting participants to the existing work of other teacher researchers there is advocacy of and steering towards practitioner research opportunities and solo and team action research projects.

The value of informal learning and requests for help with participation into it also feature in dialogues. Dialogues consider online and offline informal learning and feature discussions of the value of 'non-conventional CPD'.

Table 7: Dialogues under the learning community lens

Dialogues falling under the learning community lens show that teachers take up informal opportunities to connect and support each other to manage current careers and to develop new professional trajectories. Regarding correlation with the ETF (2014) Professional Standards, dialogues can be linked to standard 6, 'Build positive and collaborative relationships with colleagues and learners' provided we adopt a collegial interpretation casting all teachers as 'colleagues' rather than taking an organisation-focussed approach. An examination of community lens topics also shows teachers working towards standards 7, 8 and 9, updating knowledge of their subject or vocational area, accessing and leveraging educational research and literature to develop evidence-based practice and working towards 1 of the overarching statements in the introduction to the standards by being 'committed to maintaining and developing their expertise… to ensure the best outcomes for their learners'.

It is significant, beyond 'ticking' standards off a list, that 1 in 5 of the dialogues in the 6-month period examined were solely focussed on teachers building community, seeking out opportunities to work with others and engaging with and in research to develop their practice. Biesta (in Gregson et al, 2015:6) holds that educational purpose goes beyond qualification to embrace socialisation, ways in which 'adults become part of existing traditions and cultures'. We witness in the community lens dialogues teachers building professional networks that will embed them into and see them seek to progress in their practice. This can be seen in dialogues on progression to Doctoral or Master's level study, on QTLS or ATS professional formation as well as discussions on professional body membership. These dialogues evidence teachers' intentions to 'play the progression game' by participating in qualification-based frameworks or professional programmes set out by Government and overseen by officially recognised groups and Awarding Bodies.

Beyond Narrow 'Property' Definitions of Community Dialogue

Though there is evidence of dialogues on more conventional progression paths under the learning community lens, there is a need to take a wider perspective beyond the narrow 'property' definition of progression to 'fit policy agendas' (Priestley & Biesta, 2015:5). If we adopt a broader 'ecological conceptualisation' of community engagement we see teachers exercising agency to build or extend alternative networks to work against 'local constraints' regarding cultural, structural and material resources (ibid:10). Priestley and Biesta (2015:15) contend that a key issue in the formation of professional agency is availability of the resources by which teachers achieve agency, in particular access to 'relational resources' related to 'networks in which teachers were positioned socially'. If teachers judge the 'practical-evaluative' aspects of agency (ibid:15) that is the support, environment and resources provided locally by conventional professional networks to be appropriate and sufficient, then participation in wider, online professional networks will likely be redundant.

Dialogues under the learning community lens speak to informal networks which develop 'organically out of short-term needs' to help teachers connect and share expertise to develop their practice. This can lead us to say, 'we see evidence here' for a second time in response to research question 2, **'In what ways would the topics addressed during dialogues in online educators' networks be regarded as key development areas for FE teachers by recognised sector bodies?** Teachers are showing 'engagement in action, interpersonal relations, shared knowledge, and negotiation of enterprises' (Wenger, 1998:85). The focus groups and 1-1 interviews will explore what educators consider is gained by participation in the communities as when considering agency we should look beyond the 'capacity-building' function of communities to examine the 'what teachers 'bring' to the situation and what the situation 'brings' to the teacher' (ibid:20).

Beyond sanctioned CPD activity such as progression to higher level study, professional formation or active professional body membership, subversion lies in informal online discourses around, and signposting to, teacher-led learning and 'non-conventional CPD'. This activity is somewhat recursive but perhaps to be expected; participants who value non-formal networks encourage others to participate more widely in them. Biesta (2005:6) contends that a facet of educational purpose in the socialisation domain is to reproduce existing traditions, inculcated ways of being which are imposed, even insinuated, 'behind the backs' of teachers and students. Drawing on Kelly's (1999:8) ideas of the motives of a 'hidden curriculum', Biesta (2005:6) notes that socialisation can act as an engine for upholding existing social inequalities, ensuring maintenance of the status quo, prevalent agendas.

Agency is not solely about forward-moving change but may involve social patterns presenting 'active resistance' to policies which do not fit with a teacher's moral standpoints or core identity. Exercising agency, then, involves 'much more than simply following unproblematic trajectories' as autonomy

and agency are not equivalent (ibid:20). Teachers can use agency to 'bring about a future that is different from the present and the past… creatively reconfigured' in relation to 'hopes, fears, and desires for the future' (ibid:10). This would see teachers acting in efforts to be less heavily influenced by what O'Leary (2018:2) calls 'the thematic priorities of others'.

Shifting Discourses Bring Subversion to the Community Agenda

The appetite in FE leadership for an outcomes-focused, standards-based 'product' definition of teacher education, a model which teachers are expected to employ with their own learners, embeds a hidden curriculum into formal teacher CPD. This curriculum reinforces the use of professional standards and rewards adherence to recognised, approved progression routes.

Coffield (2017:45) notes that a key part of teacher CPD is the building of the professional confidence and networks to challenge the 'assumptions, methods and findings' of those setting the educational agenda. Sennett also highlights the beneficial, defensive properties of the commune. Challenges to professionality, worth or achievement must be rebutted by the community as without it, artists 'lacked a collective shield… against [clients'] verdicts' (2009:67). What we may witness in informal online communities is a resistance to dominant CPD steering, the birth of a fledgling, rival hidden curriculum, Such a 'shift in discourse' engineered by participants gaining confidence in numbers can make 'space for ideology to play' (Bernstein, 1996, in Gregson & Hillier, 2015:111).

Rooted in teacher-led communities, the rival hidden curriculum promotes an extension of the formal CPD agenda rather than a replacement of it, not hidden from those engaging with it but possibly occult from some authors of the formal CPD curriculum. Coffield contends that the course of teachers' professional learning moves beyond simple educational issues, impacting more widely on society, noting that 'a vibrant democracy' requires teachers to remain in control of and exercise autonomy over their practice (2007:388). Expert teachers transcend a narrow 'method and practice' definitions of teaching' to consider the 'ideas, values and beliefs by which that act is informed, sustained and justified' (Coffield, 2017:4).

Identity and Voice Lens Dialogues: Promoting Social Purpose Education

Propagating in rhizomatic fashion in informal online dialogues, the syllabus, and therefore the ideological values base of the rival, hidden curriculum is now explored in the consideration of the 'identity and voice' lens dialogues.

A rhizomatic network is named specifically because it operates outside conventional organisational spaces, hierarchies and constraints, having 'neither a beginning or end… multiple entranceways and exits, its own lines of flight' (Deleuze & Guattari, 1987:21). The dialogues under the identity and voice lens display rhizomatic properties and are summarised in Table 8.

The Identity and Voice Lens: 'how we define our values and advocate for them'

An examination of the **identity and voice lens** dialogues reveals that 34% of dialogues can be regarded as being values or identity-related. All 3 communities evidenced dialogues around professional identity. 1 in 6 dialogues in the Ivy community, over a third of the dialogues in the Lily community and almost half of the dialogues in the Fern community have an identity or values focus.

Topics discussed under this lens include social justice/mobility, help for marginalised communities, improving access to FE for under-represented groups, challenging simplistic judgements of teachers' professionalism and what can be termed 'political discourses'. The dialogues also discuss development of anti-fascist curricula and explore links between literacy development and participation in the democratic process.

A desire to make learners politically aware and active is evident in threads marking 100 years of women's suffrage, dialogues around redressing the 'white curriculum', discussions on actions to oppose funding cuts to the sector and threads such as 'women in education' and 'mature students' voices'.

Threads under the lens span a considerable range of other topics including learner and educator mental health, reductions in support for SEND learners, the empowering nature of adult literacy and the promotion of equality and equal access to learning. Another common focus under the lens is the impact of FE beyond the individual learner, extending to their family, their community and to future generations. This theme arises in discussions of the value of belongingness and the need to work with learners to build strong communities inside and outside the classroom, recognising the lobbying power of the group voice.

Dialogues such as 'decolonising the curriculum', 'ACL and social mobility' and 'social action and work experience' (each from a different community) speak to educators' desire to cast themselves as empowerment agents who promote the voices and needs of those traditionally under-represented in FE. Teachers speak as advocates for equality of opportunity. Perspectives around intersectionality are explored in dialogues around factors leading to marginalisation of groups, for example the compound, complex challenges faced by female ESOL learners from economically deprived backgrounds who had few role models in education or in the workplace.

The power of education as a necessary instrument for building a democratic society also emerges. Alongside the promotion of the work and achievements of women in fields traditionally regarded as male-dominated such as STEM and more generally on International Women's Day, dialogues promote widening educational participation in marginalised communities and advocate for democratic adult education. These discourses appear beside threads such as how educators might empower others.

Dialectics on instrumentalist employability-focussed curricula, performative, data-focussed organisational priorities and current Ofsted inspection practices also fall under this lens. Threads such as 'Talking back to numbers' – rebuttals to statistics', 'Data use implications for professionalism' and 'When did T&L become data?' speak to the acknowledgement of mismatches between teachers' core purpose and the focus of their organisation or the wider FE sector.

Table 8: Dialogues under the identity and voice lens

Social Justice and Promotion of Democracy: the Missing Jigsaw Pieces

A logical place to begin the analysis of dialogues under the identity and voice lens, consistent with the approach used so far in this analysis, is with a search for correlations between the dialogues and the ETF (2014) Professional Standards. Though numerous standards are identified as intersecting with the dialogues under the community and voice and pedagogy lenses, the search for links under the identity and voice lens is more problematic. Dialogues can be described as political, values- and identity-based encompassing issues of equality of access, social justice, learner emancipation, access to education and the funding for it, critical curriculum discourses and discussions around activism, teachers' status and mental health.

Professional Standards which link to these dialogues are standard 2, 'evaluate and challenge your practice, values and beliefs' and standard 5, 'value and promote social and cultural diversity, equality of opportunity and inclusion'. A deeper analysis of the identity and voice dialogues reveals that a simplistic treatment of these 2 ETF Standards will not be sufficient to capture the breadth of discourse under this lens. Teachers evaluate their practice, values and beliefs in a critical way which transcends the scope of the current Standards. Significant tensions are apparent between some values and beliefs expressed in informal online communities and the current FE funding and oversight regimes, the range of stakeholders considered, the direction and focus of the curriculum for learners and teacher-learners and how performance and progress are measured.

Key tensions occur between the vocabulary used in the Professional Standards and that employed in the online dialogues and, beyond this, which words are omitted from the Standards yet appear in online dialogues. This mismatch is particularly significant when considering the stakeholders considered in the ETF Standards' remit. The individuals and groups considered are learners, employers, peers and the organisation(s) that teachers work in and with. The identity and voice dialogues reveal significant additional focus being given to alternative constituencies. Dialogues focus on all stakeholders mentioned by the Standards but have an additional emphasis on the learner situated in their family and immediate and wider community and, beyond this, the learner as an active political global citizen, all areas omitted from the Standards.

Of equal significance are the teacher competencies given specific focus and codified in the Standards, these being practitioners' vocational specialisms, inclusive learning, educational research and pedagogical theory, use of technology, maths and English. The identity and voice dialogues go beyond this scope to consider the role of the teacher in ensuring social mobility for learners, their families and their communities through a commitment to social justice. The educators' role in the emancipation of the learner in empowering them to be become politically aware and active can be seen alongside a desire to build a more democratic society. The concepts of Social Purpose Education are evident which transcend mere 'inclusion' concerns and call for teachers to be activists as well as educators, possessing a 'moral charge' with focus on 'egalitarian and humanistic values' and commitment to democracy (Johnston, 2008:1).

Praxis, Praxis, Praxis

Only two ETF (2014) standards were drawn upon in the analysis of identity and voice dialogue threads, considerably fewer than either of the other lenses. This invites a wider consideration of teacher identity and voice beyond a standards-focussed approach. The pedagogy and learning community lens dialogues focus on the building of technical and practical wisdom and on agentic communities which work with an extended or 'hidden curriculum' for teacher CPD. Up to this point, links to practical wisdom (phronesis) have been made in terms of teachers building 'perceptiveness'

(aesthesis), 'sensitivity and attunement', good judgement in each emerging situation (Dunne, 1993: 256).

Dialogues under the identity and voice lens invite an extension of the consideration of phronesis and its aim, the building of praxis. As well as being concerned with reflective, practical application of theory, praxis relates to engagement with or realisation of ideas, an important facet of dialogues under the identity and voice lens. Praxis is values- and emotion-laden, requiring a person to 'realize excellences… constitutive of a worthwhile way of life' calling upon 'a realization of one's self', which has 'formed and revealed one's character' (ibid: 256). Identity and voice dialogues fall into Biesta's subjectification domain due to their consideration of the 'ways in which education impacts on our qualities as a person' and the importance placed on potential for learner dis/empowerment (Biesta, 2005:6), both arguments key in these dialogues.

Identity and voice dialogues evidence teachers promoting widening educational participation in marginalised communities, advocating democratic adult education and discussing how they might empower learners and their peers. Teachers show a commitment to values and ethics rather than viewing themselves simply as theory-informed, technicist 'makers' judged purely by achievement of rational outcomes. Participants do not enter into identity and voice dialogues to develop a capacity to produce a skilled operator or technician, but because they wish to join a community where, beyond simple practice-building, identity-informed praxis is understood and valued.

Here is evidence of intent to influence the content and direction of the curriculum, casting learners not as 'docile listeners' but as those empowered by teachers to view their reality as 'in process, in transformation' (Freire, 1968:81). This is a significant focus of the hidden CPD curriculum whose presence was hinted at in the learning community lens analysis. Praxis is evidenced by ethically committed action and the dialogues under the identity and voice lens cast teachers as enablers who emancipate and empower rather than as simply reactive observer-makers. Dialogues around 'decolonising the curriculum', promoting community voice and celebrating women in education and mature students' voices evidence this emancipatory stance.

Seeking Emancipation for Teacher and Learner Alike

Other areas not addressed by the ETF Standards but evident in the identity and voice dialogues are the promotion of wellbeing, emancipation and empowerment of teachers themselves. Though ETF (2014) standard 20 calls upon educators to 'contribute to organisational development and quality improvement', it can be argued that this contribution is likely to be aiding a trajectory set by organisational leadership. Opposition to the 'received wisdoms' of curriculum focus, budget allocations and quality assurance and improvement processes can be evidenced in discourses which are critical of performative, data-focussed organisational priorities and funding mechanisms. Quality systems are framed as reactions to a national inspection regime lacking nuance or sound methodology when teachers instigate dialogues such as 'talking back to data' and ask, 'When did T&L become data?' Also evidenced are criticisms of funding mechanism levers used by Government to steer curriculum or the shortfalls in support that teachers are able to draw on when facilitating it. Participants are critical of reductions in funding for SEND and ESOL programmes specifically because they consider these learner populations to be already marginalised and disadvantaged even before funding is withdrawn.

No attempt was made, quite deliberately, in this chapter to make direct links between the presence of pedagogy lens dialogues and the development of classroom practice simply by virtue of a discussion having occurred. It can be argued in the case of the identity and voice dialogues, however, that the mere presence of dialectics around emancipation, learner and community

empowerment and political activism are evidence of emancipatory praxis. That said, the educators whose interview and focus group contributions will be addressed in the next phase of this analysis are the ultimate arbiters of the relevance of these dialogues. Having completed an analysis of the dialogue threads under the 3 lenses, it is almost time to turn attention to the outcomes of the 1-1 interviews and focus groups with the purpose of corroborating or refuting the conclusions made in the analysis of the netnographic activity.

At the summarisation stage of the netnographic activity, however, it can be concluded that the informal dialogues falling under the 'pedagogy' and 'learning community' lenses are a 'good fit' for areas included in formal initial teacher education and considered in CPD programmes. Dialogues address the development areas covered by the ETF (2014) Professional Standards and involve teachers engaging in discourses around professional development and roles as vocational specialists, educators and researchers. Discussions on collaboration in communities with fellow educators and with other stakeholders including parents, employers and the wider community are evidenced, and their value significantly substantiated by literature. This leads me to hold that we can say 'yes' in initial response to research question 2, **'the topics addressed during dialogues in online educators' networks can be regarded as key development areas for FE teachers by recognised sector bodies'.**

An additional point to note is the comparative 'smooth sailing' that has been evident from the two data collection activities discussed to date. The intention of the '10 words' activity and the netnographic analysis was not to reveal challenges or tensions occurring in online community dialogues between educators but rather to highlight contradictions and tensions between the informal dialogues and the climate and direction of the FE sector, embodied in its Professional Standards. Analysis now turns to the authentic voices of the educators participating in informal online communities. A search for meaning and value gained from participation and what this reveals about FE teachers' identities is undertaken along with an attempt to determine which aspects of informal, online community involvement are contested or problematic.

Voices of the Educators, Leaders and Managers: analysis of the 1-1 interviews and focus groups

Twelve 1-1 interviews and 2 focus groups (the focus groups comprising 6 and 8 educators respectively) were conducted, allowing engagement with practitioners whose experience in FE ranged from 3 months to over 25 years.

A reminder for the reader seems useful at this point regarding the presentation of interview and focus group participants' contributions. On occasions, where lengthier vignettes of 1 or 2 sentence quotes are used, these contributions are rendered as 'fake tweets'. These devices provide an engaging visual experience for the reader and a signifier allowing identification and comparison of participants' contributions. The 'fake tweets' show a green border to signify that a quote is from a focus group and a blue border to indicate that the excerpt is taken from a 1-1 interview participant.

Validation of the 3 Lenses as a Model for Examining Teachers' Dialogues

The opening question to both interview and focus group participants concerned the suitability and applicability of the 3-lens netnographic model. Gregson et al (2007:6) consider that outcomes can be used to inform future research design through an iterative process of research and consultation, allowing stakeholders to comment upon analyses and researchers to explore how inquiry and feedback combine to give confidence in findings.

It was encouraging to be informed that the 3-lens model is considered to 'make total sense', 'stand up' and be 'worthwhile' as a concept. All participants consider that the 3 lenses described well their impressions of the thread topics and issues discussed on informal online educators' communities. One participant describes the pedagogy and learning community lenses together as being 'pre-praxis', an interesting definition considering the preceding chapter's commentary on the netnographic analysis regarding practice and praxis. Of significance is the specific recognition given to the 'identity and voice' lens.

Contributors note that they are attracted to informal online 'activism spaces' as they facilitate empowerment, enabling solitary practitioners to become more self-confident when their voices were amplified as they begin to 'realise that other people think like that too'. Dialogues under the lens are considered powerful as signified by a typical interviewee comment:

Julia @TeacherEducator2
The lenses make total sense. All 3 are areas that have broadened my ideas about my role. The final [identity] lens has been particularly powerful. Participation is very much about having a voice and exploring identity.

Experienced and Knowledgeable Enough to be Trusted

An ability for educators to exercise agency when deciding the direction and focus of CPD is a key attribute necessary in terms of motivation for and commitment to engagement in professional learning (Sennett, 2009: Blaschke, 2012: Whitehouse, 2011: Polanyi, 1967: Coffield, 2017: Jeffs & Smith, 1990: Priestley & Biesta, 2015). The 1-1 interview and focus group outcomes reveal that teachers concur with this evidence base. A significant theme which emerges is teachers' resistance to CPD sessions which did not fulfil specific, stated professional learning needs. Teachers are vocal

regarding their dissatisfaction with unwelcome, simplistic, instrumentalist CPD agendas which they consider are being imposed upon them.

The opening chapter of the thesis noted that for many teachers FE was a 'second career'; the average FE trainee teacher is 37 years old and almost 40% of sector staff are aged 50 or older (ETF, 2017b). Vocational teachers, by definition, have established backgrounds in other professions and trades and are strongly encouraged to exhibit 'dual professionalism' (CAVTL, 2013). During this work and education history, FE educators have considerable experience of being subject to vocational training before, as well as alongside, teacher education. Extended life and work experience give participants strong views on the characteristics of meaningful, effective CPD leading them to detail what it 'should look like' or 'feel like' in responses.

There is a clear need for the presence of community for effective craft building to occur (Lave and Wenger, 1991: Sachs, 2003: Kennedy, 2005: Whitehouse, 2011: Coffield, 2009, 2017). Good work focuses on 'relational thinking… clues from other people' (Sennett, 2009:51) as 'culture shapes the mind' (Bruner, 1996:11). Wenger holds that communities 'hold the key' to transformation through 'shared knowledge… negotiation of enterprises' (1998:85). Informal online dialogues exhibit many factors identified for building of a successful community of practice in the view of the focus group and interview participants. Communities are viewed as a timely evolution in peer-to-peer professional dialogues as participating educators particularly value the collaborative ethos they afford.

Escaping Silos Built on Shifting Sands

In comparison to some other workplace and education sectors, expressions of regret regarding lack of collegiality and shortage of inter-organisation learning dialogues in FE are prevalent themes. Interview and focus group participants speak of 'silo mentalities' in their organisations which result in shortages of developmental peer dialogues making day-to-day work 'very isolating'. They also comment on a lack of inter-organisation learning dialogues and opportunities to make meaningful industry links, issues attributed to the prevailing highly competitive FE climate which 1 contributor notes causes developmental dialogues to 'stall'. A shortage of professional learning communities in comparison to other EU countries is highlighted by 3 contributors, all of whom give examples of ideal CPD in their specialisms occurring outside the UK, 1 of whom notes:

Jose @CurriculumLeader2
We need to form local and wider peer support networks commonplace in Europe including subject-specific specialist dialogues. These were in place regionally here in the UK but now no longer exist due to cuts and the competitive climate in the sector.

Sector instability caused by 'policy volatility' (Policy Consortium, 2018:10) and 'alarmingly regular' standards changes (Norris & Adam, 2017:4) made by successive Governments are also cited as threats to meaningful professional learning. The evocative, storm-invoking vocabulary which Sennett (2009:50) employs when bemoaning 'churning reform' is echoed by 2 participants commenting upon the churn in both professional standards and sector oversight bodies. Others criticise instability caused by regular 'reinventions' of professional bodies. Frequent changes in sector oversight and standards are greeted with 'dismay' and the credibility of new initiatives which flowed from sector policy and funding changes were questioned. A community founder sums up teachers' frustration regarding policy churn and the resultant administrative overheads, noted by Coffield (2017), that regular new initiatives bring:

Theo @FounderModerator2
[There is] a feeling that we have lost the battle with management who do not know what goes on in a classroom and can't teach. [Initiative creators] have no ideas about how things like 'stretch and challenge' can be done in a practical sense in the classroom, we have to deal with this ambiguity, it's just bonkers.

Challenging the CPD Agenda, or 'Just Talking a Good Talk'?

Participation in professional learning is an emotive subject for participants and considerable dissatisfaction and frustration is expressed with both the focus of the current formal CPD agenda and the lack of time made available for engagement in career-long learning. Criticisms speak to use of a 'training' CPD model (Kennedy, 2005:4) adopting a 'skills-based, technocratic view' with the agenda 'determined by the deliverer' who works with passive participants. Words which arise when practitioners speak of formal, mandated CPD are 'tick-box', 'lip service', 'instrumentalist', 'mechanistic' 'context-free' and 'compliance-focussed', signs that Coffield's warning against 'simple but spurious solutions to the complex problems of teaching' (2017:4) goes unheeded. The organisers of CPD attended by these participants fail to recognise that 'layered' classroom challenges ask for 'contextualised judgement rather than for general recipes' (James and Biesta, 2007:37).

CPD has 'capacity to support underlying agendas' compatible with either 'transmission or transformation' types of professional development (Kennedy, 2005:17). Comments made on the nature of much mandatory CPD show little to make us optimistic about its value so prospects for agenda change need to be grasped. A participant who has worked in FE for over 2 decades expresses feelings of 'dismay' regarding what the sector has achieved in the past and what he considers it contributes to learning now. Two others speak of a need for teachers to be 'more tactical' in their response when 'bombarded' with words like 'innovative', 'progressive' or 'creative'. A community founder highlights the need for teachers to raise a 'collective voice' questioning the credibility of new initiatives.

As the interview and focus group participants are active participants in educators' online communities it prompts the questions 'are the online communities not a place to raise the questioning collective voice?' and 'has this not been done? Popular, mutually supportive communities may be beneficial to members allowing them to voice discontent and vent dissatisfaction without necessarily having impact on wider political agendas. Suggestions that informal communities engage in 'comfort radicalism' (Avis, 2016) rather than truly challenging sector power dynamics or orthodoxy is an issue explored with community participants later in this chapter.

Opportunist Practice Building, an Escape from the Mandatory Mundane

Evaluation of informal learning communities requires 'construction of rather different criteria' from formal learning, exploring to what extent the 'discourse was critical' (Jeffs and Smith, 1990:22) and how the experience 'furthered the good of all participants' (Grundy, 1987: 77). Contributions from the 1-1 interviews and focus groups around the 'practice' element of Wenger and Trayner's (2015:1) model of communities of practice, highlight numerous instances of teachers building practice through online community participation. Educators speak of the 'added value' which informal communities bring to their CPD as well as noting a reduction in isolation and sense of 'stuckness in organisational thinking'. Teachers employ proactive vocabulary using words such as 'mobilise', 'organise' and 'buoyancy' to describe the purposes and outcomes of community participation, highlighting in particular how communities provide 'contextualised' learning dialogues which create a 'shared repertoire for their practice' (ibid:1).

Tangible examples are given of signposting to effective learning resources and classroom strategies by interview and focus group participants. Evocative language is again used to describe how online dialogues afford 'escape' from the 'banality of stretch and challenge, British Values' enabling teachers to 'reclaim their professionality'. Coffield (2007:388) asserts that education must lie within the 'control of reflective learning professionals, sensitive to constantly changing local contexts' and that is what is evidenced in comments on the informal dialogues:

Fran @FESTEMTeacher
There doesn't seem to be an appetite for trying new strategies [in the organisation] we keep having the same conversations. Online networks allow me to turn outwards and have exposure to new ideas.

Escape from mandatory CPD allows dialogues which empower educators to become builders of 'theory that grows out of practice' freed from outside experts who tell teachers 'what to think and what to do' (Scales, 2012:1). What we witness in the interview and focus group participants' comments are evidence of specific, contextualised exchanges around classroom challenges (such as mobile phone use) which lead to the building of theory through the exchange of pedagogic case studies. This speaks to Eraut's (2000) call to reject any binary formal-informal framing of learning and instead acknowledge the value of reactive learning which is explicit, spontaneous and prompted by natural opportunities. An example of reactive professional learning is described in the following vignette detailing an online discussion on mobile phone use in class:

Shana @ACLTutor1
I came to the discussion with very clear ideas. Everyone said I was coming at it from the wrong place and needed to use phones as a supportive tool.
[Twitter dialogues] made me challenge my opinions and give me practical ideas of how I could use new strategies.

Biesta (2010:10) reminds us that vocational education by its very nature displays significant diversity in learner profile and learning context; it is an unpredictable, 'variable process'. Teachers engaging in online dialogues view professional learning as an act akin to mastering an art or craft discipline calling for 'practical wisdom' (phronesis) to be applied in each unique case. Equally popular as an aid to pedagogy-building is the 'on-demand' nature of practical advice, the immediacy of help for particular challenges which McGivney (1999) called a 'needs-based focus'. Teachers and managers report that they gain access to contextualised, solution focussed practical wisdom via informal online communities:

Beverley @ITEManager1
I've connected with many people and been introduced to information I wouldn't have found otherwise and that's great. [Online communities] are wonderful for getting answers to questions or signposting help if there's nobody else.

Such testimonials evidence the gathering of fibres of evidence in response to research question 1, **How do FE teachers who participate in online educators' networks consider that they are engaging in meaningful professional learning?** Connections are made, resources and research evidence are shared, certainly pre-requisites for meaningful CPD are being put in place, if followed through.

Risks of an Open Loop: Informed Talk, but Transformation Requires Action

Coffield (2017:41) writes of the 'transformative change' possible when teachers collaborate to 'change how they think instead of what they do' noting that transformation is a 2-stage process where educators 'generate new knowledge among themselves' which 'provokes new actions'. There are signs, however, in the educators' comments already documented to this point that informal online communities may be simply generating what we might term 'open loop dialogues'.

Focus group and interview participants speak of 'being introduced to information', 'given practical ideas' or being 'exposed to new ideas'. This is evidence of the planting of seeds of new practice but Coffield notes that collaboration must be actioned in a practical sense, not remain discursive or teachers will be 'sharing, but not implementing, good practice' (ibid: xiii). (1967) agrees that we must ask significant questions, then validate our theories with peer critique of practice.

Tennant (1997: 79) refutes unquestioningly positive views of communities of practice as some members may have an insufficient underpinning of knowledge or skills. Only one interview participant echoed Tennant's (1997) views on knowledge validity and legitimacy, noting that as identities, and therefore contribution provenances, go unchecked on Twitter, 'a lot of people talk a very good talk but what does it mean?' Four other contributors disagree, noting that an important part of the community dialogues was the ability to check users' profiles. These contributors consider that online communities allow them to engage with fellow professionals from around the country, people that they knew and had met occasionally offline but would not usually have opportunity to connect with.

We might speculate that valuable strategies and resources sourced in online spaces may be discussed, used, adapted and outcomes shared with peers on and offline, but this thesis can provide no evidence of the 'closing of the theory loop'. We certainly have evidence of the transmission of new strategies and resources considered valuable but not of critical, practical, contextualised evaluation of them. At best this absence of new action is a missed opportunity, at worst it is yet more 'practice sharing' which seems not far removed from attendance at a CPD event hosted by outside experts who tell teachers 'what to think and what to do' (Scales, 2012:1). The only difference lies in that it is online peers who do the telling. Deleuze (in Foucault, 1977:206) notes that theory cannot 'develop without eventually encountering a wall… practice is necessary for piercing this wall' and the end of short Twitter dialogues may represent such a wall.

Gatekeepers and Silos: Trust and Equity in a Fragmented Sector

Despite being critical of performative, instrumentalist, 'sheep dip' CPD in its earlier chapters, this thesis recognises the many rich and valuable professional learning opportunities available via conventional, events-based CPD in the sector. Encompassing ETF's long-standing 'Professional Exchanges, Professional Development or 'PD' Networks, new 'Teacher Regional Improvement Programmes' (TRIPs) with their action research-based initiatives, learning and research communities hosted by Centres for Excellence in Teacher Training (CETTs) and opportunities offered by awarding bodies and third sector organisations, there is doubtless a rich variety of CPD available in the sector.

That said, FE is an increasingly fragmented sector. Disparate providers pursuing diminishing funds via adversarial tendering mechanisms creates a highly competitive climate in which stakeholders 'work in silos, looking after their own interests rather than what is best for learners' (Policy Consortium, 2018:53). The perfect storm of funding cuts and a silo-based workforce, showing annual turnover of over 46% in some Apprenticeship scenarios, (ETF, 2017b), has impacted negatively upon access to

professional learning opportunities in FE. Educators cite Twitter's role in combating professional isolation as dialogues afford a 'sense of connectedness or community' (Carpenter and Krutka, 2014: 426) and teachers participating in the interviews and focus groups value collegiality and diverse external professional networks and mourn their absence.

A clear motif emerging from many of the interviews and the focus groups was the sense of isolation which teachers felt either by virtue of working in small, fragmented teams or through being a member of a larger team which rarely has opportunities to come together. Practical isolation concerns are reported as being exacerbated by a silo mentality adopted in curriculum areas or more widely across their organisations. Dialogues under the learning community lens suggest that teachers seek out online spaces to assist each other in formation of a research culture and the building or extending of professional networks, to 'share information… to learn from each other' in a community of practice (Wenger and Trayner, 2015:1).

Teachers criticise the barriers to agentic CPD imposed by organisational 'gatekeepers'. Incidences are reported of senior colleagues using elevated positions in an organisational hierarchy to withdraw either the funding allowing educators to attend independent CPD and network events or the teaching cover required to allow participation in them:

Rosa @HEinFETeacher2
At work I am an island. How else will I find out about new things when I'm not senior enough for them to pay for me to go to a conference? I'm not getting challenging conversations at work. I might if I went wider outside…this is my opportunity to network.

Interview and focus group participants particularly value the mutual professional trust evidenced in online communities, 'meaningful dialogues with challenge' are a strong draw. The appreciation of an ethos of equality is also evident, teachers noting that FE leaders and organisation managers should 'trust that teachers want to… do a good job', allowing them to engage in meaningful self-selected professional dialogues. This stance chimes with Wenger's position (in Smith, 2009:1) that communities of practice form when people share 'a passion for something they do and learn how to do it better' and Sennett's (2009:24) assertion that all craft is quality-driven work and the 'aspiration' for quality will 'drive a craftsman to improve, to get better rather than get by'. Participating educators report that 'meaningful' informal online peer dialogues are preferable to the 'hierarchical arrangements' in place within organisations, specifically because the presence of 'equity' in learning conversations is valued again, providing a further response to research question 1 '**How do FE teachers who participate in online educators' networks consider that they are engaging in meaningful professional learning?'**

Not All Rainbows and Kittens: Problematic Power Dynamics Follow Us Online

There is evidence of the presence and valuing of trust, equity and collegiality in informal online dialogues, but a critical stance is required as relationships and dialectics in communities of practice can be problematic. Tennant (1997: 79) holds that communities may exhibit 'power relationships that seriously inhibit entry and participation'. Evidence of challenge or conflict in informal online communities coming from interviews and focus groups is minimal in comparison with the benefits reported around participation. Community participants describe Twitter communities as 'collegial', 'democratic', 'reciprocal', occurring in a 'relaxed setting'. That said, if teachers consider that they are excluded from dialogues or deterred by the dynamics of a community they are likely to have

withdrawn from that space and remain invisible to studies such as this thesis which called for interview participation via Twitter communities. In the end, we can only speak with those who are 'with us in the room'.

There is evidence of some tensions within Twitter dialogues or following on from them according to the testimony of participating educators, moderators and community founders, however. It may be significant that a participant who reports 2 separate personal challenges is a female who relates 'boisterous mansplaining' behaviours from a male community participant and describes online dialogues as 'entering an arena'. It seems of significance that a challenge made by someone in a senior position which began publicly on Twitter continued via private email exchanges with her. Though the interviewee describes her reaction as 'unfazed' by these events it is not difficult to imagine another less confident participant, or someone newer to the sector or the online dialogues, being unsettled or deterred from further online engagement.

Another participant notes, when speaking of online tensions, that some managers and leaders see the mere existence and agendas of informal online educators' groups as 'a threat'. He notes that alternative online dialogues 'allow people to circumvent' a management agenda of 'institutional narrowing', allowing educators to be 'more tactical' in moves against a 'bombardment' of innovation and change. A number of participants note that a key attraction of informal online communities is that they granted educators an alternative space for the type of professional debates that teachers may no longer be actively encouraged to become involved in by their employers.

The experiences of interviewed community founder-moderators mirrors the recommendations of Cormier (2018:1), who notes that informal, rhizomatic communities 'need some structure… to make sure that everyone gets to play… a form of remediation' allowing everyone to contribute fully. A community founder/moderator who acknowledges that tensions arise at times considered that frictions are part of spirited group discussions with highly engaged contributors which get 'out of hand'. Adamant that participants are not allowed to 'defy group expectations' that everyone must be welcoming and accepting of others even during strong differences of opinion, she reminds contributors who 'kick off' that 'teachers are supposed to be role models'.

Returning to Key Issues of Identity and Values

Though the 'arena' of informal online dialogues is problematic, Freire holds that conflict avoidance helps 'preserve the status quo' (1968:42), so teachers should not be afraid to take risks and should 'unify in defending their rights'. Freire casts teachers as 'political militants' whose job is 'not exhausted in the teaching of math, geography, syntax, history' but also requires 'dedication to overcoming social injustice'. Teachers' views of informal online dialogues speak to creation of 'intellectual spaces' where, following Habermas, people 'freely debate and discuss how to build the kind of world that want to live in' (Johnston, 2008:4). The core work of the dialogues under the identity and voice lens, seen as so significant by interview and focus group participants, evidences building of a professional 'domain' within a community of practice (Wenger & Trayner, 2015:1). One community founder describes participation in informal online dialogues as:

Theo @FounderModerator2
…about asking, 'who are we?', saying 'this is what we want'. A notion of… organising outside the institution with some utopian ideas of what FE might be… around social democratic ideals that had been eroded in the hollowing out of FE.
It's about who defines what we do, our fundamental identity.

An important theme running through responses about professional identity are the strong emotions engendered when teachers speak about their practice, what one interviewee calls her 'revolutionary' work. Commitment to Social Purpose Education is a significant theme (Johnston, 2008). A personal ethics-based worldview seems central to ETF (2014) standard 2 'evaluate and challenge your practice, values and beliefs'. Participating educators cast their role as one which goes beyond development of employability-related skills to 'development of critical and active learning for citizenship' (Johnston, 2008:5). The significance of a political aspect to an educators' identity is evidenced in the '10 words' think piece activity in which the word 'political' was the fourth most popular choice, echoed by the words 'subversive', 'provocative', 'activism' and 'empowering'.

The professional values and identities articulated by participating educators evidence personae not wholly reflected in the ETF (2014) Standards with their significant focus on 'learning for earning' (Biesta, 2005:688) and overall instrumentalist agenda (Day et al, 2005, Kennedy, 2005:4, Scales, 2013). Informal learning dialogues reveal that FE practitioners have alternative purposes and core values. Participants in the 1-1 interviews and focus groups prize dialogues which speak to 'values-driven' CPD (Scales, 2012:2) 'acquiring the habit of democracy… in accordance with our democratic history, values and practices' Coffield (2015). One teacher educator describes this subversive stance:

Anya @TeacherEducator1
We are subverting the dominant paradigm with informal learning. The majority of people going into teaching really do want to make a difference in people's lives not just give them pieces of paper… to empower, help the next generation. What is your professional identity? That's not in the assessment criteria but it's the most important learning."

Social Purpose Curriculum Dialogues: Debunking Tick-Box CPD

The focus in many values and identity-related online dialogues falls on a need for a holistic approach to design of curriculum and to the CPD of educators facilitating it. Johnston (2008:2) holds that social purpose educators must be 'clear about their values' and 'maintain personal and political integrity' (2008:2). The need to view the whole learner and their needs emerges in educators' informal dialogues, evidenced in a desire shown by interview and focus group participants to work holistically on design of a social purpose curriculum. Curriculum is considered a complex body of work and a holistic, 'macro' approach to professional development is required. Teachers talk of digging underneath to ask fundamental, critical questions on 'what underpins what we do' noting that dialogue participation is 'very much about having a voice and exploring identity'.

A key aspect of online dialogues is a rejection of the pulling of CPD curriculum focus down to reductive, tightly-defined 'micro topics' such as how educators might 'embed' promotion of British Values into sessions. Dialogues take a nuanced approach appreciating intersectionality (Crenshaw, 1991). Cultural patterns which can cause learners to be disadvantaged are recognised as interrelated, influenced by systems in society, affecting us to varying degrees depending on race, gender, class, ability, and ethnicity. Complex factors that cause, for example, a female ESOL learner from a deprived community to become marginalised are acknowledged by educators and include access to course funding. Educator habitus includes a disposition for giving more powerful voices to those not traditionally heard or whose needs are not usually given precedence. The community doxa holds that education's purpose is not to better individual's employment prospects or make them suitable 'raw materials' for a productive workforce but to promote holistic, individual growth and build potential, agency and even emancipation in the family and wider community.

Educators resist the 'banking concept of education' which turns students into 'receptacles' to be 'filled' by their teacher (Freire, 1968:72) calling for a 'reinvention' of CPD which enables teachers to reframe their CPD agenda to 'critically consider reality' (ibid:72):

Howard @ITPManagerTrainer
We work in a tick-box, compliance culture where we have to embed A, B and C into our practice. Informal communities meet a need for us to move away from this and set our own CPD agendas.

Educators' dialogues and responses in both interviews and focus groups, resonate with the ideas of Dewey (1956), Lave and Wenger (1991) and Knowles (1950) in the need to form CPD communities which act as 'laboratories of democracy' which 'critically provoke the learners' consciousness… face the dominant power' and the 'myths' which it uses to express its ideology (Freire, 1998:40). One such myth appears to be that tick-box CPD can lead to quantifiable, higher performance by teachers and so higher Ofsted grades and learner satisfaction rankings, a stance resisted by teachers:

Rhys @CurriculumLeader1
[We work in a] …Trip Advisor world whose focus is on grading on a star system and on judgement rather than on development. I want reciprocal, collegiate professional learning, challenging and frank but working on democratic principles.

If educators consider that their identities are not fully reflected in professional standards or in the current CPD , this may be a reason for the rejection of mandated CPD in favour of dialogues which reflect teachers' values more closely. Wenger (2007, in Smith, 2009:1) contends that communities of practice can be made up of 'a tribe learning to survive… seeking new forms of expression… defining their identity… helping each other cope'. Crowther and Martin (2018:8) draw on Freire's ideas when noting that the choice is stark: education is either for 'liberation' or 'domestication'. They contend that for Freire, there is 'no neutral position in these matters: to sit on the fence is to take the side of the status quo'. There is evidence of contested narratives regarding practice and purpose, 1 teacher describes his practice as 'distracted by achieving compliance' while another remarks that teachers and their managers fundamentally disagree regarding the core purpose of teaching and learning.

Coffield (2017) holds that pedagogy transcends any narrow 'method and practice of teaching' and must be considered alongside the 'ideas, values and beliefs by which that act is informed, sustained and justified… what the culture values' (2017:4). He further contends (2015:1) that educators 'have a responsibility as well as a right… by law' to become 'equal, social partners' in the 'formation, enactment and evaluation' of policies which impact their professionalism. This theme of taking charge of agendas is a powerful one, reflected in the comments of educators:

Phil @HEinFELeader1
Teachers need to build their own narratives which are not focussed on a recipe to achieve a set of outcomes… they need to take experiences away from CPD dialogues and contextualise them.

Leaping from the Springboard: Issues of Recognition and Impact

Strong opinions are expressed on the shortfalls of much mandatory CPD and anecdotal evidence has been gathered regarding valued alternatives which informal online communities can offer. It's still behoves us to ask of online, informal CPD, 'where is the evidence of impact?' Referencing Avis's (2017) work on 'comfort radicalism', a community founder considers informal dialogues valuable for professional learning but remains 'pessimistic' about how discourses might change education policy or inform 'political understanding of FE' in order to shape that understanding.

What remains after receiving a pessimistic political impact prognosis is to address research question 3, **'What evidence do educators report of any formal recognition of impact from informal online learning opportunities?'** There is scant, anecdotal evidence from contributing educators of any formally recognised impacts of use of informal online communities for CPD. The absence of formal recognition may be fitting given the informal nature of the dialogues. McGivney (1999) concurs, holding that informal learning goes unrecognised by participants and the organisations they work in. More tangible impact evidence, certainly of FE managements' preferred, quantitative, outcomes-focussed nature, is not readily available. An interview participant refers to informal online learning opportunities as 'messy', a view substantiated by Eraut (2000) who notes that the term 'informal' may imply that dialogues have an 'unstructured' nature.

There is certainly evidence stemming from this thesis that teachers find informal online dialogues valuable and participating sector leaders concur regarding their worth. That said, there is little evidence that educators formally document learning from online community participation. The value gained from signposting to resources, strategies, support and networking opportunities is not formally recognised in organisational records, the impact equivalent of 'Catch 22'. Eraut (2004: 249) holds that informal community participants do not acknowledge the scope or worth of experiences as their learning is 'largely invisible… taken for granted'. Wenger (1999: 4-5) concurs that experiential, participatory learning, rooted in the social experience of daily life is 'ubiquitous', 'ongoing' and 'often unrecognized'.

That said, there are early signs of formal recognition from a curriculum leader interviewee with significant management responsibility. Dialogues which began in an informal online community are continued in a formal setting via a pilot which uses excerpts and outcomes as thought-provokers during in-house learning conversations. This evidences expansion of rhizomatic networks, spreading from an original, online 'middle' which 'grows and overspills' displaying 'multiple entranceways and exits… its own lines of flight' (Deleuze & Guattari, 1987:21).

Interview and focus group participants comment when reporting on impact of informal online dialogues that communities are 'a springboard', a 'beginning' to valuable learning, providing beneficial, on-demand support. The description of online communities by 1 manager as 'pre-praxis' spaces seems apposite as dialogues which are often 'technicist' and 'performative' only lay the foundations for praxis. Other contributors posit that if deeper, complex professional dialogues water the seeds sown in the communities, then meaningful professional learning can occur. Given the current climate in an FE sector which prizes immediate learner impact, absence of rapid, tangible results is likely to affect the legitimacy of the online dialogues in the eyes of managers. Coffield, however, holds that there is a 'serious weakness' in measuring effectiveness of learning by immediate results, reducing impact to 'what can be easily measured' (2017:4) until audit becomes a 'form of learned ignorance' (ibid:33).

‘The Usual Suspects’: Challenges of Reaching a New Audience

Any evidence of the widening of online dialogues is of particular relevance as several focus group and interview contributors note that social media dialogues are unlikely to be reaching a ‘new audience’ of educators who participate in CPD via informal online means while rejecting traditional opportunities in their organisations.

Numerous participants comment that online learning communities are composed in the main of what we might term ‘the usual suspects’ in terms of CPD commitment and innovation. These practitioners are described as ‘always the first’, as ‘pathfinders’ in discovering new professional networking opportunities and alternative platforms for dialogue, people known to be already active networkers who view professional learning as a key part of their role and identity. These teachers value new networks where they can exercise agency, steering the direction of their CPD agenda to a greater extent than they might in their own organisations. They are not, however, likely to be new learning dialogue participants.

The next and final chapter provides a summative response to the 3 research questions posed in this thesis, drawing together the evidence threads from this research, seeking what conclusions may be drawn. It suggests some recommendations based on thesis outcomes for its intended constituency, FE teachers and teacher educators, but further addresses FE leaders and managers, its oversight bodies and the policy-makers influencing FE’s future trajectory.

Chapter Six: Conclusions

Sell-By Date: Questioning the Continued Relevance of This Work

Any lengthy endeavour can be overtaken by events. Changes in Government, new theories, emerging technologies or fresh research may render a work obsolete, so an audit of this work's continuing relevance is a useful place to 'begin the end'. This thesis was triggered by the starting pistol of ETF's 2015-16 workforce data which found that almost two thirds of FE staff reported engaging in no annual CPD (ETF, 2017a). The following year, 38% of respondents to ETF's Training Needs Analysis (ETF, 2018a:56) stated that some CPD was 'tick box', designed to meet organisational or external requirements.

ETF's latest workforce data reveals almost no change in median CPD hours undertaken on the previous year; a quarter of FE staff spend fewer than 30 hours per year on CPD, a slight drop from 28% the year before (ETF, 2019b:49). What is notable is that the Foundation now elects to exclude zero hours CPD from the data, the justification being that 'entries of zero may simply reflect a lack of a recording mechanism' (ibid:49). The word 'may' leaves us uncertain as to how many zero hours reports are due to reporting shortfalls and how many occur because staff undertook no CPD. It is of concern that an absence of CPD reporting mechanisms is acknowledged, then accommodated, not questioned or corrected, speaking to the perceived value of teachers' CPD. We can conclude, however, that the average number of annual CPD hours undertaken by FE staff has not undergone significant change over the last 3 years.

Teachers' informal, social media-based learning dialogues, the concern of this thesis, continue 'burgeoning' in terms of participation and academic interest (Bergviken-Rensfeldt, Hillman & Selwyn, 2018:230). Despite the popularity of informal, online communities, understanding of them 'remains under-developed' (Lantz-Andersson, Lundin & Selwyn 2018:310) demanding 'renewed scrutiny' of their form and consequences (2018:303). An investigation of the way in which informal online communities shape teachers' self-identity and professional status requires, significantly for this thesis, a 'content analysis' of teachers' interactions beyond self-reporting (ibid:313). The growing popularity of little-examined, informal online networks and the stalemate in growth and relevance of conventional forms of teacher CPD signify that this thesis has continued importance to the sector.

What's in a Name? Signifiers of Ideal CPD in a Values-based Framework

A brief precis of the indicators of successful professional learning from authors cited in the literature review will be useful to frame this chapter's findings. Equally, a reminder of the personal values and identity stances adopted will be valuable.

Language use and language change recur as significant themes in this thesis. Culler (1997:59) holds that readers must be mindful of the 'settings of their language', examining meaning and changes, attending to 'categories through which we unthinkingly view the world' (ibid:60). The transfer of professional learning dialogues from classroom to social media platform can presage further language change. Concepts can be 'slippery' and language 'exported from one discourse to another' may 'convey quite a different meaning' (Gregson & Hillier, 2015:111) as Bernstein notes, (ibid:111) 'every time a discourse moves there is space for ideology to play'.

Language examination is important work in education when terminology around learning and teachers' performance adopts words such as 'robust' and 'rigorous', whose denotation is lost as 'official texts have, through overuse, rubbed them smooth of meaning' (Coffield 2017:43). Ideal professional learning, being cautious of the use of the word 'ideal' but calling on definitions offered by respected writers, requires agency, community and a clear sense of purpose and identity.

The need to exercise agency, taking charge of narratives to become one's 'own maker', is noted by Sennett (2009:72) as skill 'develops within the work process… connected to the freedom to experiment' (ibid:27). CPD should be based on identified needs, be sustained, subject-specific, be classroom-based, iterative and importantly collaborative in communities which can be 'informal in nature', notes Whitehouse (2011:10). Bruner (1996:11) holds that 'culture shapes the mind' and encourages engagement in critical peer dialogues as does Wenger who advocates 'action, interpersonal relations, shared knowledge, negotiation of enterprises' (1998:85). Coffield (2017: xii) adds that collaborative dialogues must be modulated by practical, peer-led action or teachers will be 'sharing, but not implementing, good practice' (2017: xiii).

Professional practice building requires patient attention as excellence is 'not an act but a habit… we are what we repeatedly do' (Aristotle in Durant, 1991:76). Akin to arts and craft disciplines, such as mastering an instrument, Sennett (2009) and Biesta (2010) remind us that honing of classroom practice requires subtle judgements and practical wisdom. Developing a capacity for 'the right response' (Heilbronn 2011:49) requires the teacher to draw on ethical codes and personal values, a 'rootedness' of action in 'character, disposition and qualities'. Freire (1998:41-42) contends that the teacher must be unafraid of risk, challenging themselves and their learners during career-long growth to 'critically consider reality' (ibid:72). CPD, then, enables educators to become more 'educationally wise in their doing and being' (Biesta 2010:10) to build craft, allowing teachers 'to get better rather than get by' (Sennett, 2009:24).

Reviewing the Data Collection Activities and Research Questions

This chapter reviews evidence collected on the impacts of informal online learning and the challenges present in its use. Its arguments are built upon 3 data collection and analysis activities responding to 3 central research questions:

1. How do FE teachers who participate in online educators' networks consider that they are engaging in meaningful professional learning?
2. In what ways would the topics addressed during dialogues in online educators' networks be regarded as key development areas for FE teachers by recognised sector bodies?
3. What evidence do educators report of any formal recognition of impact from informal online learning opportunities?

The first data collection activity, the netnographic analysis (Kozinets, 2010), examined dialogue threads from 3 informal online FE teachers' Twitter communities over a 6-month period. Netnographic techniques aid development of understanding of cultural behaviour in an online domain, in this case a Twitter community. The technique requires researchers to 'immerse themselves' in the culture of a 'digital tribe' (Bartl, Kannan & Stockinger, 2016:167). Low inference descriptors, taken directly from community users' hashtags (#), and the keywords highlighted by Twitter algorithms were used in coding the meanings from Twitter threads.

A thematic analysis of Twitter dialogue threads gave rise to my development of the 3-lens model of dialogues shown below in a reminder of Figure 2:

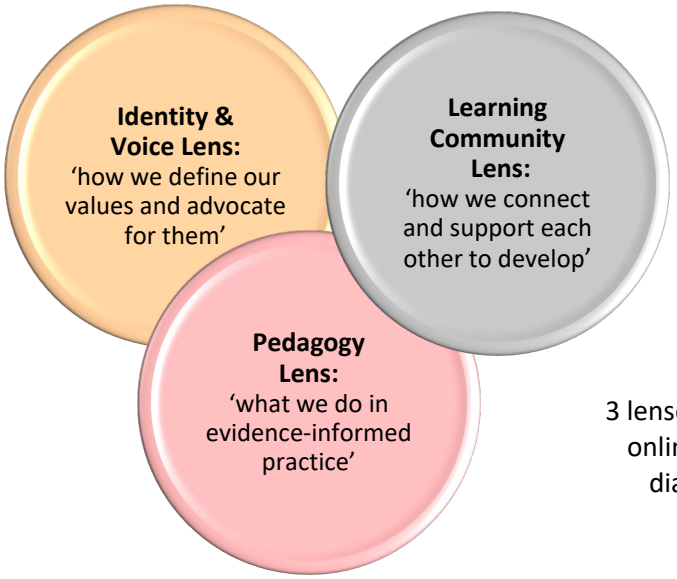


Figure 2:
3 lenses of educators' online community dialogue focus

The 3-lens model developed from the netnographic thematic analysis is a device, a focussing tool, to enable discussion of the form, nature, impacts, and challenges of informal dialogues. The new model can be used as an object of comparison with teachers' everyday practice and to discuss contrasts between the focus of formal and informal teacher training and career-long CPD. An original plan was to use direct quotes from Tweets to convey authentic community dialogues, but this was abandoned as online search facilities render it impossible to guarantee the anonymity of authors.

The 3-lens model was scrutinised using member checking in semi-structured 1-1 interviews and focus groups. The gender mix of participants was 54% : 46% F/M, contributor ages ranged from mid-twenties to over 60 years of age, geographical distribution spanning the far south west of England to the far north-west of the country. All 26 interview and focus group contributors had knowledge of the informal online communities considered in the netnographic analysis. Contributors spanned all social media user types including community founders, moderators, regular, occasional, seasoned and new contributors and 'lurkers' who view dialogues and use information from them but do not participate actively (Kozinets, 2010). Sixteen vocational subject specialisms as well as teacher education were represented; 3 participants had leadership and management responsibility alongside teaching commitments, 2 holding senior curriculum leadership roles.

The interview and focus group analyses employ interpretative, qualitative study using narratives to describe human actions, a valuable strategy for examining educators' informal learning. This approach enables actors to 'tell the stories of their lives and experiences' highlighting 'identity work', conveying how teachers 'construct selves within specific institutional, organisational, discursive and local cultural contexts' (Golding, Brown & Foley, 2009:51). In addition to being asked to validate the netnographic 3-lens dialogue model, contributors were questioned on benefits drawn from using online communities and on challenges presenting themselves. Managers and those with roles in teacher education were further asked to comment on the relevance of the online community dialogues to key FE development areas. All participants were asked whether, and if so how, they formally acknowledge, document or disseminate outcomes from community engagement.

Eschewing a planned approach of use of an initial online questionnaire to gather teachers' impressions of informal online learning takes me away from past, positivist approaches to research. Embracing an interpretivist world using the netnography-based 3-lens model as a 'springboard' discussion tool in interviews and focus groups means abandoning a search for 'proof' of impact while still seeking imprints and signifiers of meaning from online community participation, a challenging but fascinating task.

Vignettes of significant responses from interviews and focus groups are rendered throughout the later thesis chapters in the form of 'fake tweets' providing a signifier of each contributor's teaching or Twitter community role while preserving all-important anonymity:

Anya @TeacherEducator1
We are subverting the dominant paradigm with informal learning. The majority of people going into teaching really do want to make a difference in people's lives not just give them pieces of paper… to empower, help the next generation. What is your professional identity? That's not in the assessment criteria but it's the most important learning."

The final data collection activity uses an adapted form of social network analysis. The SNA method, initiated for studying more conventional community-based networks, is recognised as valuable for investigations of networked learning (Laat et al, 2007). The method analyses relationships between actors or exchanges of dialogue between them. The activity nods towards the brevity of spontaneous Twitter interactions, asking interview and focus group contributors to describe their impressions of informal online learning in 10 discreet words. Contributors' responses are collated in a word cloud. A reminder of Figure 3 conveying its outcomes is shown below:

Figure 3: Word Cloud generated from the '10 Words' social network activity

Are We All Happy? Challenges of Measuring Impact of Informal Learning

Any teacher who has attended formal, face-to-face CPD will be familiar with the extensive feedback forms, often termed 'happy sheets' which they must complete before leaving. The forms gather 'marks out of 10', on everything from catering quality to achievement of the event's learning outcomes as well as seeking to capture the far more contentious measure of the impact of CPD on practice. Quantitative analyses then seek to gauge the success of events, though it is uncertain how accurate prognostications of impact can ever be.

Spontaneous, informal learning yields no such tangible imprint, leaving us to search for subtle impact signifiers, a problematic task which this thesis set out to undertake. The 'hard', outcomes-focussed indicators favoured by Government and sector leaders are inappropriate measures for researchers of informal, undocumented, often unrecognised learning (McGivney, 1999). We must hold in mind that outcomes-based impact measures are 'necessarily crude' (Gardner, Holmes & Leitch, 2008:89), smoothing data outliers. Reducing education 'to what can be easily measured' suggests accountability-related motives, 'social and political control' operating within a 'culture of blame' (Coffield, 2017:4). To measure teachers' professional learning meaningfully we must move beyond considering what is easily measurable lest 'audit become a form of learned ignorance' (2017:33) used combatively, not developmentally.

Presentation of conventional evidence is 'rendered impractical' in small-scale practitioner research (Gardner, Holmes & Leitch, 2008:89) so this thesis employs what I term a 'campaign of persuasion' for the value of informal online learning, remaining critical of shortfalls while offering soft indicators of impact. Remembering that 'measurable and observable are not equivalent' the 'vicarious experience… complexity… mystery' (ibid:89) and impacts of unconventional learning can be revealed by gathering 'multi-various' data items which can 'cohere into a mutually supportive and therefore arguably credible source' (ibid:97). A narrative based upon 'real life stories' and 'bottom-up evidence' using online dialogues and the authentic voices of educators allows 'proxy' measures of impact to be collected showing teachers engaging in 'activities associated with the processes through which impact occurs' (ibid:99).

Twining Together Threads of Impact: Meeting Sector Needs

When framing my identity as a teacher in the methodology chapter I drew upon Social Purpose Education values (Johnston, 2008). Beliefs in the principles of teacher agency and autonomy and craft development ideals allowed me to conclude that this thesis should not be 'about teachers', but rather 'for teachers'. It may, therefore, seem strange to begin a summary of findings by addressing research question 2, '**In what ways would the topics addressed during dialogues in online educators' networks be regarded as key development areas for FE teachers by recognised sector bodies?**' It is important, however, that teachers' informal learning dialogues are aligned with sector and CPD aims embodied in ETF's Professional Standards (2014). The 3-lens model is a useful new focussing tool to employ in answering this question, allowing comparison of informal learning dialogues with the formal CPD curriculum and the Professional Standards which codify it.

'Pedagogy lens' dialogues can find favour with those setting standards and steering FE CPD as discourses display a good fit with the ETF Standards' domains of 'professional skills' and 'professional knowledge and understanding' (ETF, 2014:2). Teachers discuss what works best in their

teaching, evaluate their practice against theory and research evidence and participate in dialogues around classroom strategies and use of learning resources.

Pedagogy lens dialogues are rooted in Biesta's qualification domain building the 'knowledge possessed by an expert' through dialogues around roles, strategies and resources, the 'how and with what' of practice (Gregson et al, 2015:5). Parallels can be drawn between pedagogy lens threads and the FE teacher training curriculum, albeit in organic form, free from assessment. Teachers engage in activities 'associated with the processes through which impact occurs' (Gardner, Holmes & Leitch, 2008:99), discussing perennial, complex challenges such as building learners' confidence as well as more mundane annual events such as course induction.

Comments from leaders, managers and teacher educators participating in interviews and focus groups corroborate the value of pedagogy lens dialogues. Managers are critical of the compliance agenda of much mandatory CPD, one describing it as 'teacher training, not education'. Online dialogues provide opportunities for 'subverting' CPD agendas and are described as 'valuable', meeting teachers' needs with their 'collaborative', 'contextualised' nature, giving opportunities to explore 'challenging' and 'critical' questions.

Evidence-informed practice is not developed through solitary reflection but is intentionally undertaken in community by educators using social media. Biesta's socialisation purpose of education embraces how 'adults become part of existing traditions and cultures' (Gregson et al, 2015:6).

Dialogues under the **learning community lens** evidence CPD aims aligning with the ETF Standards' 'professional values and attributes' domain which requires teachers to 'build positive and collaborative relationships' (2014:2). Teachers use online dialogues to connect and support each other to manage careers, seek opportunities for new professional trajectories, update subject or vocational knowledge and access educational research. Dialogues on progression to Doctoral or Master's level study or seeking advice on undertaking practitioner researcher projects show teachers seeking career and academic progression, forming research identities. Discourses around professional memberships evidence an intention to play a 'progression game' and show peers seeking guidance on qualification-based or professional programmes set out by Government and overseen by recognised bodies. Online dialogues help peer connections but also aid links with parents, employers and industry contacts evidencing 'interpersonal relations, shared knowledge, and negotiation of enterprises' (Wenger, 1998:85) areas prized by the Professional Standards.

An 'ecological conceptualisation' of community requires a broader consideration beyond socialisation. Alternative professional networks enable teachers to work against 'local constraints' to cultural, structural and material resources, a key step in formation of professional agency (Priestley & Biesta, 2015:10). If teachers judge 'practical-evaluative' aspects of agency (ibid:15), the support, environment and resources provided locally by conventional networks to be appropriate and sufficient, then participation in alternative online networks would likely be redundant. Presence of online dialogues evidences that participating teachers are not finding supportive environments in their local areas and existing conventional networks.

A curriculum leader participating in a 1-1 interview is unsurprised that educators fail to attend 'poorly designed' mandatory CPD which fails to meet their learning agendas. Managers judge informal community dialogues to be 'valuable professional conversations' allowing critical, informed, peer-led, contextualised discourse. Another manager welcomes the opportunities to broaden

professional networks that the communities afford. She has been introduced to information which she would not have found without participating in the community dialogues and notes that discourses are 'wonderful for getting answers to questions' for isolated teachers.

Meeting Needs in Isolating Times - Not Curing All Ills

Managers describe online community dialogues as 'all about autonomy and agency', as 'thought-provoking' and 'innovative', but leaders contributing to the focus groups and interviews concur that brief online dialogues are no panacea, no substitute for sustained professional discourses. Managers concur with Coffield that developmental collaboration must be actioned in a practical sense or teachers will be 'sharing, but not implementing, good practice' (2017: xiii).

Informal communities are valuable springboards to agentic professional learning, but are beginnings, not ends in themselves. A description of informal online dialogues as 'pre-praxis' by a manager is powerful. He notes that communities provide 'virtual help', often 'technicist' in nature. Informal learning is described as 'accidental', 'messy' in need of formalising through deeper, purposeful discourse.

Two other managers also consider that informal online dialogues do not draw in a new audience; doubt is expressed that educators will participate in informal, online CPD while rejecting conventional opportunities. Online dialogues are thought to be populated by a constituency of teachers already active in professional networks, committed to ongoing CPD in their organisations. Managers hold that these educators have found new professional dialogues where they can set the CPD agenda, an agency they cannot exercise in their own organisations.

Drawing upon this evidence, the response to research question 2 is that topics discussed during informal online dialogues align well to the ETF (2014) Standards and can be said to address key CPD areas for FE teachers set by recognised sector bodies. FE managers and curriculum leaders concur that online dialogues are valuable, but sound notes of caution that they are merely springboards to successful professional learning and are currently reaching only a constituency already committed to CPD and agentic professional networking.

Adding the Fibres of Teachers' Voices to the Cable of Evidence

Critics of the value of informal online dialogues will rightly make the argument that the presence of discourse on 'topic X' is not evidence of meaningful professional learning. A rebuttal to these criticisms is to draw parallels between informal online dialogues and one-off, face-to-face CPD 'events'. Professional learning does not occur through random proximity effects and whether dialogues are valuable is decided not by occurrence but by consequent impression. Explicit focus on learner outcomes as a success metric for CPD is problematic. Establishing positivist cause-effect of teacher CPD on learner success given the array of variables in play between 1 learner group and its peers or 1 college term and the next is not possible (Whitehouse, 2011). Coffield identifies 'serious weakness' in linking more effective teaching to improved student achievement as practice development 'boils down to' that which achieves better exam results (2017:4).

An interpretivist stance is required, seeking subtle, qualitative impact indicators to determine if informal online dialogues can be said to increase teachers' agency, confidence and self-efficacy,

improve progression opportunities or indicate that educators develop 'capital' making them better supported in their work roles (Gregson et al, 2007:29). The response to research question 1 calls for the authentic voices of teachers using informal, online communities and the community founders and moderators who instigated and now moderate them. Question 1 asks, **'How do FE teachers who participate in online educators' networks consider that they are engaging in meaningful professional learning?'** The 3-lens model proved a valuable device which met with approval from participating teachers regarding its completeness. The model allowed practitioners to compare and articulate key differences between agentic, informal CPD and its formal, mandatory counterpart.

Teachers participating in interviews and focus groups use vivid vocabulary to describe much formal, mandated CPD as 'tick-box', 'lip service', 'instrumentalist', 'mechanistic' 'context-free' and 'compliance-focussed'. There is criticism of organisational 'silo mentalities' which restrict or remove opportunities for peer dialogue making teachers' work 'very isolating'.

In informal, online dialogues, theory and research evidence is explored yet discourses draw from classroom experience and evidence situational approaches involving what Sennett (2009:288) terms 'shared experiment, collective trial and error'. Teachers demonstrate that they value task-orientated, problem-centred pedagogy, developing practical wisdom and seeking to be builders of 'theory that grows out of practice' (Scales, 2012:1). Teacher voices from interviews and focus groups report 'meaningful' online peer dialogues preferable to 'hierarchical' arrangements in place within organisations, 'equity' being a common theme. Dialogues are said to challenge opinions, give practical advice, to allow teachers to 'turn outwards' to gain exposure to new ideas.

The 10-words think piece evidences teachers describing the dialogues as critical, supportive, engaging, immediate, accessible, thought-provoking, knowledgeable, practical, enriching and worthwhile. It is notable that teachers also choose to use their 10 words to evoke the ethos of the dialogues as well as the outcomes. Dialogues are described, in stark contrast to the descriptors used for mandatory CPD, as being collegial, equal, open-minded, hierarchy-free, democratic, equitable, accessible and inclusive, summed up by one teacher's use of the word 'trust'.

Tempering the Accolades: Power Dynamics Cross the Digital Barrier

Informal online dialogues can be problematic. Significant challenging traits are the tensions and power dynamics highlighted by 1 moderator and 2 regular participants. Though these individuals are in the minority in raising concerns, and note that tension is not a regular occurrence, we should not ignore warning signs of community discord.

A regular community participant encountered 'boisterous mansplaining' from a male in a senior position which she reports she was happy to rebut. The exchange moved to private, 1-1 email dialogue away from the supportive community gaze at the instigation of the other party. We may speculate that a less confident individual with fewer years' experience in FE may have been intimidated by this trajectory. A community moderator corroborates that tensions can occur, explaining that she had to 'weigh in' on occasions to 'set expectations' for courtesy. She notes that any interventions were due to animated, contentious dialogues getting out of hand rather than the presence of significant aggression.

Power dynamics and cross-sector tensions seem, on occasion, to cross the digital barrier with ease. Social media dialogues 'offer opportunities to circumvent traditional power relationships' (Cohen, Manion & Morrison, 2017:458) and subversion of embedded management agendas by teachers can

be met with resistance. An ‘online disinhibition effect’ allows participants to share feelings and problems online that they may not reveal in person. The ‘messy democracy’ of social media ‘affords particular kinds of robust interaction’ which can be productive but also ‘hypercritical and forceful’ (ibid:462). A regular online community participant notes that tensions in online dialogues mirror segregations in a fragmented, competitive FE landscape in which individuals define themselves in very different ways which is ‘divisive politically’. He holds that some managers consider the communities ‘a threat’ as alternative dialogues ‘allow people to circumvent… institutional narrowing’.

The benefits of informal online dialogues articulated by educators and community founders are not nullified by tensions inherent in them but are modulated by problematic aspects. The fact that animated, challenging and critical dialogues are occurring can be viewed as a positive outcome, but the presence of tension reinforces a need for respected, firm moderator presences in online communities.

Despite tensions, which are likely present in any professional dialogues, a response to research question 1 is that participating educators report exercising agency to engage in critical, challenging learning dialogues. Teachers discuss evidence-informed strategies, exchange resources and provide signposting to professional opportunities in a mutually supportive network. What seems most important to teachers is that they are authors of their own CPD agenda, able to propose and discuss topics which have direct relevance to their professional context.

Identity and Voice Threads: A Rival Hidden Curriculum is Woven

To this point this review has focused chiefly on the pedagogy and learning community dialogues and on teachers’ and managers’ responses on pedagogy and professional networking. A fuller response to research question 1 concerns teachers’ activity in the socialisation and subjectification domains Socialisation can act to reproduce existing traditions, inculcated ways of being imposed by insinuation ‘behind the backs’ of teachers and students (Biesta, 2005:6) via a ‘hidden curriculum’, an engine upholding existing inequalities and maintaining the status quo (Kelly, 1999:8).

Again, the 3-lens netnographic model of informal online dialogues proved valuable. Referral to identity and voice lens dialogues allowed the opening up of conversations on core values and identity. Using this lens, teachers were able to articulate clearly what sits at the heart of their professional values and frames their ideals regarding the core purpose of FE. Beyond discourses on sanctioned CPD, subversion lies in online FE communities’ advocacy of ‘non-conventional CPD’. Participants encourage peers to participate more widely in informal networks. A teacher participating in an interview calls the communities ‘activism spaces’ and another, considering the 3-lens model, notes that identity and voice dialogues resonated as ‘particularly powerful’ because participation is ‘about having a voice and exploring identity’.

Agency involves presenting ‘active resistance’ to challenges to moral standpoints rather than ‘following unproblematic trajectories’ (Biesta, 2005:20). Teachers use informal dialogues to become less heavily influenced by the ‘thematic priorities of others’ (O’Leary, 2018:2) who seek to set the CPD agenda from within the sector and beyond. Coffield (2017:45) notes that a key mission of teacher CPD is the building of professional confidence allowing challenge to the ‘assumptions, methods and findings’ of those setting the professional agenda. Sennett highlights the beneficial,

defensive properties of the commune in this respect. Challenges to craft worth or achievement can be rebutted only by community, as without it professionals lack a 'collective shield' against the verdicts of their critics (2009:67). A teacher in an interview response notes that FE's competitive climate has caused peer dialogues to 'stall'. Another speaks evocatively of having 'lost the battle' with managers who are uninformed of what occurs in the classroom, unaware of how the 'ambiguity' of teaching defies any simplistic solution.

A 'vibrant democracy' requires that teachers are able to exercise autonomy over their practice considering the 'ideas, values and beliefs' by which inform and justify teaching (Coffield, 2017:4). What we may witness in informal online communities is the birth of a fledgling, rival hidden curriculum, a 'shift in discourse' provided through confidence in numbers, Sennett's 'commune' providing 'space for ideology to play' (Bernstein, 1996, in Gregson & Hillier, 2015:111).

Formation and articulation of teachers' identities and values occurs in the rival curriculum of the **identity and voice lens** dialogues. The subjectification domain's consideration of ways in which education 'impacts on our qualities as a person' (Biesta, 2005:6) and its potential for learner dis/empowerment is key in these dialogues. Equally, the ways in which a teacher's core identity and beliefs impact upon curriculum design and classroom practice are central issues. Educators note the 'added value' which informal communities bring in release from 'stuckness in organisational thinking', 'escape' from mandatory 'banality', enabling them to 'reclaim professionality'.

Teachers use informal dialogues to evaluate values and beliefs in a critical way which transcends the scope of the ETF Standards (2014). Under the Standards' remit, stakeholders considered are learners, employers, peers and organisations that teachers work in and with. Identity and voice dialogues reveal significant additional focus on learners situated in their family and immediate and wider community and, beyond this, on students as active, political, global citizens. The '10 words' think piece activity revealed that educators use the words 'subversive', 'provocative', 'activism' and 'empowering' to describe community participation. Social Purpose Education values are evident, casting teachers as activists as well as educators, doing work which possesses a 'moral charge', a focus on 'egalitarian and humanistic values', commitment to democracy (Johnston, 2008:1).

Dialogues invite wider consideration of phronesis and its ultimate aim, building of praxis. This value- and emotion-laden endeavour requires teachers to 'realize excellences… constitutive of a worthwhile way of life', which has 'formed and revealed one's character' (Dunne, 1993: 256). Rather than viewing themselves simply as theory-informed technicist makers judged by achievement of outcomes, teachers join online communities where identity-informed praxis is understood and valued. A community moderator reinforces the social purpose stance, holding that participation is about asking, 'who are we?' noting that communities allow organising outside institutions 'around social democratic ideals' which define 'our fundamental identity'.

Teachers wish to influence the content and direction of the curriculum, regarding learners not as 'docile listeners' but as collaborators and co-designers empowered to view reality as 'in process, in transformation' (Freire, 1968:81). Teachers wish to frame their own professional learning in the same vein. Ethically committed praxis is evident in dialogues around redressing a 'white curriculum', 'decolonising the curriculum', promoting community and women's voices, dialogues which recognise intersectional perspectives (Crenshaw, 1991). An interview participant's comment sums up her teaching goal as 'to empower, help the next generation' echoes this ethos.

Teachers' habitus, the 'dispositions… and structured propensities to think, feel and act' is created through socialised norms, dependent on social assets such as community (Navarro 2006: 16). The

habitus evidenced in informal online teachers' communities speaks in opposition to some of FE's received wisdoms. Discourses are critical of performative, data-focussed priorities and quality assurance and improvement processes. Quality systems are framed as reactions to an inspection regime lacking nuance and sound methodology, evidenced by dialogue threads such as 'talking back to data' and 'When did T&L become data?'

Also evident are criticisms of funding levers used by Government to steer curriculum and the scarcity of support that teachers can draw upon to facilitate learning. Participants are aware of issues around intersectionality, being critical of reductions in funding for SEND and ESOL programmes specifically because they consider these learner populations to be already marginalised and disempowered. Criticisms of cuts to the Educational Maintenance allowance (EMA) affecting learners from deprived backgrounds and lack of local assistance for disabled learners are criticised.

Pulling the Threads Together, Acknowledging a Significant Absence

This thesis began by asserting that online communities require 'renewed scrutiny' as there is no informed consensus on their form or impacts (Lantz-Andersson, Lundin & Selwyn, 2018:303). A netnographic study has added to the knowledge of the form of online dialogues, modelling them using a 6-month sampling. Pedagogy and learning community dialogues can be mapped to the ETF (2014) standards and linked to work by authors of key texts on practice development providing entwined 'fibres' in the 'cable' of evidence of value (Gardner, Holmes & Leitch, 2008:98). It can be argued that the mere presence of identity and voice dialogues, dialectics around learner and community empowerment provide evidence of seeds of emancipatory praxis. The sustained presence of emancipatory dialogues over 6 months of netnographic observation signify teachers' need for and valuing of these discourses.

This thesis has provided evidence through interview and focus group contributions that FE teachers, leaders and managers find value in informal online communities and that the discourses focus on areas of direct relevance to professional learning. Imprints of informal learning codified in Jeffs and Smith's flexible model are present in community organisational structures (1990:6-12). Eraut (2000: 12) would recognise online community work as 'reactive learning'; it is spontaneous, prompted by unfolding events and natural opportunities. The examined communities can be said to exhibit imprints of transformative CPD as dialogues 'support increased professional autonomy' (Kennedy, 2005:16). Sennett's notion of a 'vigorous cultural materialism' (2009:326) allowing teachers to be critical of power structures and the ideologies behind them is evident. Educators question the ethos of mandatory CPD activities and critique the context and political implications of their learning.

The area in which limited evidence can be presented is in response to research question 3, **What evidence do educators report of any formal recognition of impact from informal online learning opportunities?** Participatory, situated learning in informal communities of practice is 'ubiquitous… ongoing… often unrecognized' (Wenger, 1999: 4). McGivney reminds us that informal learning goes unacknowledged by participants and organisations and Eraut (2004: 249) holds that it is 'largely invisible… taken for granted'. These words on unrecognised informal learning resonate with the findings of this thesis. Only One interview participant reports formally recognising and logging participation in informal online dialogues as a part of her annual CPD.

It is possible that other online dialogue participants may have internalised the value gained from community participation. In a sector which prizes hard, outcomes-focussed impact evidence, CPD which is informal in nature may remain equally informal in terms of acknowledgement of its worth.

Informal learning may remain of intangible benefit to wider professional practice if the activity cannot readily produce data on improved learner outcomes. Provision of 'proof' of impact is a challenge for all advocates of informal learning, online and off. Though 'measurable and observable are not equivalent', subtle, short-term changes to practice can be 'implausible or difficult to observe' (Gardner, Holmes & Leitch, 2008:89).

If gathering of conventional evidence is 'rendered impractical' in informal scenarios (ibid:89), then the capture of a 3-lens model of community engagement and the gathering of individual, authentic voices of expert teachers can be the foundations of a new evidence base for impact. An interview participant who logs time spent in online community dialogues as CPD also uses dialogue outcomes, and associated resources gathered online, in formal, face-to-face CPD in her organisation. She may be a lone voice evidentially speaking from this thesis, enabling Twitter dialogues to cross the in/formal learning barrier, but Golding, Brown and Foley agree with her stance, holding that we should not regard informal and formal attributes of learning as 'somehow separate'. Our task is to 'integrate or hybridize them' as 'interrelated whether we will it so or not' (2009:52), Coffield's (2000:1) in/formal learning 'iceberg' is, after all, one continuous block of ice, demarcated only by the waterline.

Language Changes, Leaving CPD Behind

Informal CPD may occur and go unrecognised, but an alternative possibility is that words have become separated from action where CPD is concerned. Language use is a key concept in this thesis, but a problematic one. Language lags behind change as it is inherited through conservative tradition, the complex nature of language providing further resistance to change (Culler, 1997). Language may exhibit synchrony, having commonly understood static attributes, or may show diachrony, variance within a system due to historical or political events (Saussure, 1916). Through new uses of language we 'attempt to bend or reshape… the categories through which we unthinkingly view the world' to 'see a different reality' (Culler, 1997:59-60).

The results of language change may be what we observe in CPD in FE. Rather than declining, professional learning may have 'moved with the times' due to ready availability of online, asynchronous discourses on informal communities. Perhaps professional learning in FE continues but is separated from its signifier as educators participate in CPD informally but do not recognise or document it, especially when the activity is undertaken without organisational mandate.

An alternative perspective advanced by an interview participant is that teachers report that they are undertaking little or no CPD because they do not regard mandatory, performative in-house 'training' to be CPD. Events informing teachers how to use organisational document templates or a new data management system are dubbed 'teacher training, not CPD' by an interview participant. Such events are not considered to be CPD by teachers because no meaningful professional learning occurs.

Gregson and Hillier (2015:111) note that concepts can be 'slippery' and 'exported from one discourse to another… convey quite a different meaning'. The term CPD may have been appropriated by sector bodies and understood by some organisations and leaders to be a narrow range of mandatory activities, the embodiment of the behavioural objectives model of teaching. Dunne's criticism of this 'royal road to efficiency' intended to rescue teaching from 'woolly-mindedness and muddle' delivering rational, accountable practice (1993:8) is that it denies the messy business of teaching. The concept of engagement with learners is neglected. There is no 'psychic tension' and emotions are permissible 'only as the content of certain affective objectives'

which the teacher is able to plan and control. It can be argued that the majority of FE teachers would fail to recognise a classroom 'disembedded' from 'cultural or political contexts and traditions' finding it far from the 'tacit and nuanced ways' in which they interact in practice (ibid:15).

If the link between practice and moral purpose or situated culture has been severed in simplistic, cause-effect 'when X happens, do Y' training sessions, it can be appreciated why such events are not regarded by teachers as CPD. Ideas can be used to 'promote and legitimize the interests of specific groups of people' dominant in society (Bernstein, 1996, in Gregson & Hillier, 2015:111). Perhaps we are witnessing a battle for the 'heart and soul of CPD' played out in just the same way as we see tensions between education being viewed as 'learning for earning' or being considered a lifelong, holistic need and entitlement.

What Goes Unsaid: Notable Absences from Teachers' Informal Discourse

This thesis has not adopted any significant aspects of postmodern methodology which tends to be 'abstract… removed from a specific situation' (Cohen, Manion & Morrison, 2017:73) as this practitioner research is intended 'for teachers' in FE. Postmodern ideals do, however, chime with my own celebrating 'difference, diversity, subjectivity'. Their relativistic perspective on 'what constitutes worthwhile knowledge' resonates with this thesis' exploration of informal CPD and, as I am a contributor to the dialogues investigated in this thesis, I am 'part of the world' I research (ibid:25).

Themes addressed in this thesis show similarities with aims of postmodern discourse analysis even if there is no 'explicit agenda' of critiquing inequality or seeking to 'transform and emancipate society' (ibid:687). Critical theory's focus on the emancipatory potential of diverse perspectives, the 'revolt against cultural control' through 'questioning of received wisdoms' (Pring, 2015 in Cohen, Manion & Morrison, 2017:25) echoes themes emerging from identity and voice dialogues. A nod towards the critical dialogue analysis strategy of examining 'what goes unsaid' is valuable at this point as examination of the formal CPD agenda can help to throw into relief the informal online dialogues. We should ask 'what areas seem absent or infrequently addressed in teachers' informal online dialogues which are evidenced in formal CPD events?'

A review of the CPD offer from major sector stakeholders *The Association of Colleges* (AoC, 2018) undertaken concurrently with the netnographic research revealed pedagogy-related workshops on 'Promoting Independent Learning', 'Student Mental Health' and 'Maths and English Development'. The remaining AoC events were of a performative nature; 5 were performance data-related, 9 were finance- or funding procurement-related and 4 focussed on improving Ofsted preparation and performance. In the same time period, the ETF CPD offer (ETF 2018b:2018c) comprised 7 online courses devoted to the discrete topics of Safeguarding, British Values, the Prevent Agenda and Equality and Diversity, a total exceeded by 8 sessions on performance data management, funding procurement and Apprenticeship provision.

A single online module was offered by ETF with a focus on 'Professional Values, Beliefs and Behaviours' (ETF, 2018c). The 1-hour module included peer observation, professional standards, metacognition, assessment and feedback, communication, motivation and, finally, 'evolving beliefs and values'. It is of interest that the 'evolving beliefs and values' topic discussed learner motivation, fostering creativity and the teacher's need to acknowledge different academic routes, abilities, styles and intelligences. Focus was placed on the role of FE in securing national and personal economic success through the development of learners' employability and workplace skills. Transmission of cultural identity and community tradition was noted in passing as a purpose of education, firmly

framed in the need for preparing students for life and work in a global marketplace. This is not to say that identity-related dialogues are not undertaken in some teacher-led ETF events such as Professional Exchanges and similar networks, merely that ETF's online offer at that time has a distinctly performative flavour.

Uncritical discussions around data collection and inspection performance did not feature as dialogue threads in any of the educators' informal online communities during the netnographic analysis. Priestley and Biesta (2015:1) hold that educational policies have 'actively de-professionalized teachers' through use of 'highly prescriptive curricula'. The 'frequency and extent of output regulation' in performative cultures has resulted in teachers distancing themselves from personal values in order to 'play the game' (2015:3-4). Reluctance to engage in uncritical data- and performativity-centred dialogues sees teachers using alternative informal dialogues to distance themselves from the policy agenda 'game' to set their own professional learning courses.

Dialogues on discrete topics such British Values or the Prevent Agenda are absent from informal online dialogues examined in this thesis. This does not signify that such areas are not considered, rather that they are addressed in holistic approaches. Learner behaviour and attitudes are discussed in threads such as 'inclusion' and 'democratic adult education', dialogues focussed on development of learning spaces founded on equality, respect, tolerance and democracy (these being the British Values). Informal community discussions reject piecemeal, tick box approaches to pedagogy and do not consider promotion of British Values as something to be 'embedded' as a discrete competence, developed in isolation from a wider inclusive curriculum.

Common formal CPD topics such as Apprenticeship delivery, employer voice and employability certainly feature in informal online dialogues but are not given the significance and prevalence that formalised CPD programmes place upon them. Informal dialogues focus instead on teachers' identity and values and the core, holistic, lifelong purpose of educators' roles. Informal dialogues demonstrate commitment to social justice, promotion of 'critical democracy', a core belief that education has a key role in preparing learners for 'living well in a world worth living in' (Aristotle in Kemmis et al, 2014:27).

Topic variance between stakeholder-mandated CPD and agentic, informal dialogues speaks to a disconnect between the formal CPD curriculum and teachers' understanding of their professional roles and CPD needs, their learners' needs and what best serves learners' wider communities. What was unexpected from the point of view of my own preconceptions, even as an active participant in informal online communities, was the proportion of dialogues that fall within the scope of the identity and voice lens.

Doxic Emergence: A Sign of the Times

FE teachers' online dialogues evidence a CPD agenda which intersects with yet contradicts the agenda, even the habitus, of sector leaders. A disconnect is revealed between educators' aims and the goals of those funding, setting and quality assuring the curriculum. Bourdieu, when describing doxa, holds that what is essential to a group 'goes without saying because it comes without saying' as 'tradition is silent, not least about itself as a tradition' (1977:167). Though doxa can lead groups to forget causes of inequality and adhere to self-evident 'relations of order', doxa can empower if it enables questioning of legitimacy of discourse (Bourdieu 1984: 471). Bourdieu conjectures that the

doxic 'universe of the undiscussed' might be overhauled if 'drastic socio-cultural disruptions… give rise to critical consciousness' (Deer in Grenfell, 2008:118).

Coffield (2018) holds that such significant upheaval is now evident in the UK, caused by substantial internal political shifts, impacts of austerity and the EU Referendum and extra-national concerns including climate change. We may now be witnessing crises sufficient to exacerbate, even empower doxic overhaul. Teachers' dialogues originally intended for pragmatic professional learning may be developing which question the tacit rules of the game of FE. By refusing to know their proper place, a joining of informal community voices may provide teachers with opportunities for leveraged cultural capital. If informal online dialogues consistently question rubber-stamping of instrumentalist, neoliberal 'learning for earning' agendas (Biesta, 2005:688), Freirean, social purpose counterpoints can build a reframed doxa. It will be important, however, for agents of any emergent doxa to recognise their own assumptions and beliefs when asserting its validity or supremacy (Deer in Grenfell, 2008:125).

The question of which CPD discourse will 'gain hegemony', is inextricably linked to issues of power as the ways in which 'certain identities are legitimated and privileged over others' decides value in educational contexts (Golding, Brown & Foley 2009:35). Foucault (1988: 11) holds that we can build 'spaces of freedom' which host discourses in opposition to prevalent political climates. Social media discourses may have a role in the building of such spaces. Informal dialogues allow teachers to 'speak back' to neo-liberal narratives and the reframing of teachers' social and political identities can allow them to 'engage, invigorate and reconnect learners' (Golding, Brown & Foley 2009:48).

An interview participant describes her subversion of a performative CPD agenda as 'revolutionary work'. Another sounds a cautionary tone that the informal, online 'freedom' and 'activism' spaces explored in this thesis can ever bring a utopia of equality and emancipation. He notes that informal dialogues can become monopolised by the 'dominant voices of a few dozen people' and remains 'pessimistic' about how informal communities can change education policy or 'political understanding of FE' in order to shape that policy.

Swimming Against a Weaker Tide?

This chapter opened by discussing the continued relevance of this thesis and closes by noting a development in sector oversight since work began. A potential narrowing of the gap between teachers' expressed identity and purpose as articulated in this thesis and the FE climate may come in the unlikely shape of Ofsted's new Educational Inspection Framework (EIF) (Ofsted, 2019). Following criticism of an inspection regime which rewarded immediate outcomes-driven, 'teach to the test' learning, the revised EIF took effect in September 2019. The framework 'expresses the shift and refocus' of inspection process towards 'quality of education offered, focussing on how teachers implement knowledge scaffolding' in an 'incremental process of helping learners to make connections between the new and what has already been learned' (TES, 2019:1). There appear some echoes of the desires expressed by teachers regarding the need for holistic, broad learning in the adjusted ethos of the new EIF.

What may not have changed so radically is FE's learning agenda, the 'what' rather than the 'how'. Professional Standard 2 (ETF, 2014) requires teachers to 'evaluate and challenge… practice, values and beliefs'. It was argued, playfully, early in this thesis that when an educators' ethical audit reveals values and beliefs running contrary to the ETF standards and the prevalent sector ideology that

these standards and ideologies may, like the deity in *The Hitchhiker's Guide to the Galaxy*, simply disappear 'in a puff of logic' (Adams, 1979:6:23).

Areas such as development of 'embedded' English and maths skills, fluency with technology and consideration of employers' needs were deemed of significant importance to be explicitly codified in FE's Professional Standards, setting these areas as key benchmarks for teachers' CPD and a focus of their performance appraisals. Key themes identified as the focus for the 'identity and voice' lens which can be summarised as 'education's democratic, social purpose', 'holistic views of the learner and their life', 'community, belonging and voice' and 'learner as active, empowered political citizen' are not found in the vocabulary of the ETF (2014) standards.

Biesta urges teachers to balance educational purpose during 'moments of judgement', by questioning what we 'seek to achieve' and how we 'organise and enact' practice based upon 'values and preferences' (Gregson et al, 2015:6-7). A significant balance 'moment' is required during conflict situations when teachers encounter tensions between core values and facilitation of a contrary, mandated curriculum. Teachers may be 'pulled in different directions', required to make 'trade offs' (ibid:8) to accommodate different interpretations of educational purpose and the standards held by practitioners, learners, managers and those funding and judging FE.

Teaching is not 'about the production of things'; we do not 'produce' students, they are the 'human beings we encounter in educational relationships' rooted in communication (Biesta, 2018:18). Teachers must consider their purpose and develop 'the art called praxis', the 'good action' at the core of subjectification domain to ensure that learners can become 'subjects in their own right, and not stay or become objects of the actions and directions of others' (ibid:18).

Recommendations for Sector Action and Further Research

What Next for This Thesis?

It is hoped that this practitioner research thesis has 'conceptual' and 'enlightenment' potential (Gardner, Holmes & Leitch, 2008:92), providing new ways of framing teachers' informal online communities and the wider CPD agenda they promote, offering insights into community benefits and challenges.

This research has produced a tangible, valuable new focussing tool in the form of the 3-lens netnographic model of teachers' informal online dialogues. The model's utility has been proven in dialogues with teachers, allowing discussion and comparison of informal learning encounters with everyday practice and enabling practitioners to explore the formal CPD focus set for them in the sector through FE's Professional Standards.

Experiential evidence such as the authentic voices of FE educators also aids stakeholders' understanding by providing a relatable, 'real world element' (ibid:22). Dissemination of practitioner research may 'give visibility' to research outcomes but, much like informal online dialogue, there is no guarantee of impact on FE policy or practice. Work may be 'forgotten or even unknown' to policy makers and implementers (ibid:92). Practitioner research conferences and publications and FE networking events will aid wider dissemination and discussion of this thesis and it is encouraging that I can now reach larger, more diverse audiences by leveraging social media.

This thesis has raised as many questions as it answers. Researchers should seek to map the teachers' online learning community rhizome and establish if there is new wine sitting in digital bottles, and whether dialogues amplify an emerging, emancipatory doxa for challenging times. The outcomes of this thesis will benefit from discussion by FE teachers, teacher educators and managers. This chapter closes with a summary of the main thesis conclusions linked to recommendations for those working in and with the sector and highlights the need for further research.

Summary of Conclusions and Recommendations for Consideration

This practitioner research is intended for teachers, so they are the first constituency addressed. Informal online communities are no panacea. There are tensions and 'messy' undocumented outcomes, but their popularity evidences a welcome chorus of voices at a time when teachers report a growing sense of isolation caused by 'silo' working. This thesis closes by linking 'headline summaries' of its conclusions to practical calls to action for those working in the FE sector or having oversight for it.

To Fellow Teachers

Finding:
Informal online communities allow FE practitioners to engage in valued, critical practice- and identity focussed dialogues which aid practice development and reduce isolation in an increasingly fragmented sector. Participating teachers should encourage and enable peers to join informal online learning dialogues, providing the peer support required to allow new community members to gain full benefits and successfully navigate the challenges of social media environments.

Beyond this, all FE practitioners should be practitioner researchers, investigating their own practice, whatever form it may take as this is great personal and professional value in this action.

Recommendation:
Participating teachers should actively encourage peers to join informal online dialogues, to 'dip a toe' into online community water. Advocacy for the value of alternative dialogues and calls for peers participation first need to be instigated in conventional face-to-face networking spaces. 'Lurkers' and those resisting community participation quote shortages of technology access, digital skills shortfalls, lack of knowledge of social media etiquette ('netiquette') and self-confidence barriers as deterring factors. Sympathetic peer support and guidance is required. Participating teachers also need to raise awareness of community value with their managers and to sector policy-makers, inviting them to experience alternative discourses, lest the community dialogues become an echo chamber.

Moreover, I strongly encourage FE teachers to become researchers into their own practice if they have not already done so. Practitioner research has afforded me an invaluable opportunity for personal and professional development as well as allowing me to lend my voice to the evidence-informed practice base in the sector. Following my experiences with the writing of this thesis, I highly recommend practitioner research to educators as an engine for personal and professional growth. Beyond simple practice-building, research allows practitioners to explore their identity and to question or affirm their place in the sector, enabling them to be a more confident, more connected part of adult education.

To Fellow Teacher Educators

Finding:
Entrants into teacher education in FE, and indeed teacher educators, need to be enabled to integrate use of online communities and learning technologies and wider informal learning into their developing pedagogy in an informed, evidence-based, contextualised manner. Use of the 3-lens model and the authentic voices of educators conveyed as vignettes in this thesis can be valuable as devices to allow teachers to explore and discuss informal social media-based pedagogies and integrate them into practice.

Recommendation:
The 3-lens netnographic model can be used as a powerful focussing and comparison tool. Its use will allow new FE teachers and their trainers to explore the contrasts in focus between popular online communities' informal learning, the formal teacher training curriculum and their own organisation's in-house CPD programme. This comparison will allow them to explore what might be missing from, or less well addressed in, formal programmes. Beyond this, exploring the detail of the dialogue threads under the identity and voice lens in particular can encourage practitioners to explore their own core values, to ask how these relate to the Professional Standards for the sector and discuss how identity and values impact upon practice and professional development needs.

Teachers are urged to take 'social constructivism to the digital age' by Kjaergaard and Sorensen who hold that extensive teacher training is needed if educators are to devise 'authentic pedagogic designs' for online community use (2014:1). Organic, rhizomatic community growth is energetic but haphazard, so future development needs to be on an evidence-based footing. The 3-lens model can be used as a device when discussing and developing digital pedagogies for use in digital social learning. Use of the model here allows focus to be placed on all 3 necessary aspects of critical informal dialogue for teachers, pedagogy, community and identity. In addition, the authentic voices

of FE teachers conveyed in vignettes in this thesis can be used as case study excerpts to advocate for the value of and challenges inherent in social media community use for professional learning. Informal online communities now extend to draw in teachers working in compulsory, school-based education and also reach into Higher Education so the 3-lens model and vignettes can be equally applicable as discussion and comparison tools beyond FE to examine any educators' discourses.

Wenger (2007, in Smith, 2009:1) notes that learning communities comprise those seeking 'new forms of expression', undertaking the important work of 'defining identity' and an alternative voice expressing a broader identity for educators is emerging from educators' informal online spaces. Teacher educators must become evidence-informed users of online communities if they are engage trainees in reflective use of them. Trainees' engagement should begin with reviews of research such as this thesis, continue with nuanced appraisals of community value and be followed by initial participation allowing netiquette to be mastered, digital pedagogies to be explored and skills challenges to be overcome. Teachers should be encouraged to learn from their own learners, some of whom may well be less circumspect, but more experienced, adept users of social media.

To FE Leaders and Managers

Finding:
A significant and broad evidence base developed over decades confirms that teachers need to be allowed to exercise agency in decisions and actions around their professional learning. FE's highly contextualised learning scenarios and diverse adult learner groups make it particularly unsuitable for one-size-fits all, bite-sized, teacher CPD 'events'. Practitioners are highly critical of the performative, instrumentalist CPD agenda prevalent in the sector. They wish to be regarded as experts who should decide and action their own professional learning. They need to be given an investment of time and funding and allowed to form learning networks both on and offline.

Recommendation:
Mandatory CPD has been criticised by teachers contributing to this thesis as uncontextualized and bite-sized, not allowing continuing, deeper dialogues on personal meaning or application of learning to classroom contexts. The authentic voices of teachers represented in this thesis can be used by FE managers as a reflection prompt, encouraging them to consider the differences revealed between informal online CPD and its formal, mandatory counterpart. Leaders and managers should explore the form and differences in themes between the CPD they provide and the professional learning undertaken in community where educators exercise agency in CPD choice.

The voices of teachers who use agency to engage in informal dialogues around CPD needs should be acknowledged and encouraged. Both teacher educators and CPD managers could capitalise on the popularity of informal online dialogues by using them as a model and a primer for in-house CPD. Strategies such as that employed by an interview participant of taking online dialogue outcomes back to her organisation as CPD discussion topics, so hybridising the dialogue, must be considered. Ways of successfully integrating such hybrid learning into FE practitioners' existing pedagogy need to be explored and researched to better inform the sector of new ways of working.

To Government and Sector Bodies

Finding:
FE's Professional Standards reflect Government priorities which cast teachers as makers of skilled

employees for the workforce, realising an 'learning for earning' agenda (Biesta 2005, 688). Employability, Functional and technology-related skills are prioritised. The ETF Standards somewhat intersect but remain at odds with the identity and values of FE teachers. The 2014 Professional Standards should be reviewed and be authored and owned by the teachers. Teachers should be served by co-created professional standards not be made simply subject to them as part of an appraisal process.

Recommendation:
The ETF Professional Standards devised for and with the FE sector are now over 6 years old (ETF, 2014) and give employers' needs primacy, fixing the role of FE as a provider of 'learning for earning'. The informal dialogue vignettes and 3-lens model developed in this thesis highlight mismatches between FE teachers' values and priorities and the current Professional Standards, These differences are witnessed particularly in the authentic voices of contributing teachers and the themes of the 'identity and voice' dialogues. Identity and voice dialogues provide a tantalising glimpse of a democratic, sustainable, post neo-liberal world where education has significant focus on self-empowerment and clear purpose beyond and outside formal work structures. Practitioners prize identity-focussed dialogues highly and it is time for these discourses to be introduced fully into the world of formal teacher CPD.

Recognition of the need for growth of the self and the intrinsic value to learners' health, wellbeing and family of lifelong learning needs to be codified. Omitted from the Standards is significant recognition of teachers' desire to develop the learner as a whole person, as an empowered, political citizen of local community and global society. Absence of recognition of learners as active 'world citizens' at a time when climate change and shifting political agendas have global and local impacts is stark. Low electoral turn-out and apathy amongst younger voters in particular is bemoaned, but no mention is made in FE's Standards of promotion of active community citizenship, social responsibility or of issues around sustainability which particularly impact FE's younger learners. FE's Professional Standards have become somewhat outdated, overtaken by circumstance.

A need to remain apolitical yet still be relevant to those teaching in a world with diverse global challenges needs to be embraced by the Standards, yet their economic capital focus suggests that they are already somewhat political in nature. A re-balancing rather than a rewriting of the ETF Standards is in order. Online dialogues emerging under the identity and voice lens suggest the need for a realignment which better considers teachers' stated core values and identity as partners in a learners' journey to independence and happiness as well as to the workplace.

To Fellow Educational Researchers

Finding:
Further research is certainly required to gather more concrete impacts from informal online learning activities and how these may in turn give rise to other communities in a rhizomatic network. How hybrid, social learning models might successfully be used more widely in FE requires further exploration. Though it is more challenging to gather imprints from informal, spontaneous professional learning, if its value is to be acknowledged and lessons are to be learned from any successes it yields, further practitioner research projects are necessary to better investigate it.

Recommendation:
The area of informal learning in general and particularly that of online dialogues is a topic ripe for further research. A sustained examination of informal online dialogues and more particularly any

tangible impacts they may have on teachers' practice remains a relatively unexplored area. This thesis alone has uncovered tensions in online dialogues, suggestions of dominance by certain voices and implications that no new actors are involved in CPD in their population alongside testimonials of some tangible benefits. Broader, longitudinal consideration of a wider number of communities and more diverse participating actors is needed to add to the provocations offered by this thesis.

In particular it will be important that research is performed to gather more concrete impacts from informal online learning activities. If it can be established why, when and how teachers are using outcomes and resources from online dialogues in the classroom and to inform other professional learning then these outcomes can add to the research base guiding better informed use of social media for teachers' learning and FE learners' progression.

Responses to this thesis are invited from all sector stakeholders addressed above. It seems fitting that any responses be Tweeted to me for follow-up, tagging my Twitter handle @realtimeedu.

A Final Word on the Essential Human Perspective

Haraway holds, in her *Cyborg Manifesto* (1985), that we are moving into a post-human age in which we will witness the breaking down of boundaries between human and machine, see physical and non-physical becoming less distinct. Personally, I concur with Hyland who sees technology as providing the potential for 'transformative epistemology… an extension of human capability' but holds that the human aspect is key (2018: 15). Use of technology is a social process and the 'extended mind' of the online community sees 'minds and hands… inextricably conjoined'. Technology may place the world 'at our fingertips', but Hyland reminds us that fingertips 'are connected to hands manipulated by bodies and minds' (ibid: 16).

To close by adopting a brief autoethnographic stance, it is encouraging to note that a recent conference I attended (which had its origins in a popular online community) drew leaders from FE and Ofsted who presented their views on FE's future and, importantly, took questions and heard representations from FE teachers on the future of this important sector.

Informal online FE educators' communities like the one which birthed that conference are in their infancy, none yet being a decade old. It will be fascinating to witness how online community doxa develops, who steers and shapes the dialogue and whether agentic subversion of teacher CPD can confound the more pessimistic prognoses of the online communities' impacts on the sector.

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Professional Standards for Teachers and Trainers in Education and Training – England

Introduction

Teachers and trainers are **reflective** and **enquiring** practitioners who think **critically** about their own educational assumptions, values and practice in the context of a changing contemporary and educational world. They draw on relevant research as part of **evidence-based practice**.

They act with **honesty** and **integrity** to maintain **high standards** of ethics and professional behaviour in support of learners and their expectations.

Teachers and trainers are 'dual professionals'; they are both subject and/or vocational specialists and experts in teaching and learning. They are committed to maintaining and developing their expertise in both aspects of their role to ensure the best outcomes for their learners.

These expectations of teachers and trainers underpin the 2014 professional standards, with their overall purpose being to support teachers and trainers to maintain and improve standards of teaching and learning, and outcomes for learners.

The professional standards are set across three sections each of equal importance: each links to and supports the other sections.

The 2014 professional standards:

- **set out clear expectations of effective practice in Education and Training;**
- **enable teachers and trainers to identify areas for their own professional development;**
- **support initial teacher education;**
- **provide a national reference point that organisations can use to support the development of their staff.**

The corresponding Guidance, which was developed with the support of practitioners, aims to help teachers and trainers use the standards and apply them to the context in which they work.

The Education & Training Foundation

www.et-foundation.co.uk

Professional Standards

As a professional teacher or trainer you should demonstrate commitment to the following in your professional practice.

Professional values and attributes

Develop your own judgement of what works and does not work in your teaching and training

1 Reflect on what works best in your teaching and learning to meet the diverse needs of learners
2 Evaluate and challenge your practice, values and beliefs
3 Inspire, motivate and raise aspirations of learners through your enthusiasm and knowledge
4 Be creative and innovative in selecting and adapting strategies to help learners to learn
5 Value and promote social and cultural diversity, equality of opportunity and inclusion
6 Build positive and collaborative relationships with colleagues and learners

Professional knowledge and understanding

Develop deep and critically informed knowledge and understanding in theory and practice

7 Maintain and update knowledge of your subject and/or vocational area
8 Maintain and update your knowledge of educational research to develop evidence-based practice
9 Apply theoretical understanding of effective practice in teaching, learning and assessment drawing on research and other evidence
10 Evaluate your practice with others and assess its impact on learning
11 Manage and promote positive learner behaviour
12 Understand the teaching and professional role and your responsibilities

Professional skills

Develop your expertise and skills to ensure the best outcomes for learners

13 Motivate and inspire learners to promote achievement and develop their skills to enable progression
14 Plan and deliver effective learning programmes for diverse groups or individuals in a safe and inclusive environment
15 Promote the benefits of technology and support learners in its use
16 Address the mathematics and English needs of learners and work creatively to overcome individual barriers to learning
17 Enable learners to share responsibility for their own learning and assessment, setting goals that stretch and challenge
18 Apply appropriate and fair methods of assessment and provide constructive and timely feedback to support progression and achievement
19 Maintain and update your teaching and training expertise and vocational skills through collaboration with employers
20 Contribute to organisational development and quality improvement through collaboration with others

www.et-foundation.co.uk

Appendix 2: Research Information sheet / Participant Consent Form

The research and its use: information for participants

Title: Growing Concerns: practitioners' positions on engaging in professional learning in a deregulated Further and Vocation Education (FAVE) sector.

What is the purpose of the study?

To investigate the different models of professional learning (CPD) occurring in the sector, including informal learning, and examine how these influence practitioners' practice and perceptions of their professional identity. This research will contribute towards my thesis.

Why have I been asked to participate?

You have been invited because you are, or have been, an educator in the sector and have probably engaged in either formal or informal practitioner CPD in the last year. This means you may be well placed to discuss your professional learning in terms of its form, impact, evidence and how engagement with it forms part of your professional identity.

Do I have to take part?

Participation in the research is done on an **entirely voluntary basis**. If you elect to participate, you will be asked to read this document thoroughly, retain a copy for your records and sign an informed consent declaration. **You are free to withdraw at any time and without giving a reason for this.**

What will I have to do?

After giving informed consent, you will be invited to take part in some or all of the following research activities as you consider appropriate:

- A 1-1 interview either conducted in person or via a digital network
- A small focus group with fellow educators conducted in person or via a digital network (if you are a conference attendee only)

You will be asked about the CPD you have undertaken and/or facilitated and how this has supported your professional development. Demands on your time will be respected and durations kept to an agreed minimum. In some cases, I may wish to do some short, follow-up interviews.

In addition, you may be asked if you are willing to give permission for either or both of the following:

- Inclusion in the research of contributions you have made to an online educators' networks
- Inclusion in the research of verbal contributions you have made at an event e.g. a conference, Professional Exchange or FE Teach Meet network (if you are an attendee only).

You will be free to decline to participate in or respond to any activities you consider inappropriate.

Will the information I give be able to be attributed to me by name or by other identifying factors?

All information that is collected during the research activity will be kept **strictly confidential;** your name and other details such as your location or organisation name will not be used in the thesis which documents this research so you will not be able to be recognised.

What types of content contributed by me might be used in the research?

When the research is published, collated group data and/or direct quotes from interviews or online communities which you attended or participated in may be used. These will all be anonymised so that you will not be able to be identified. The consent form allows you to 'opt out' of direct quote use if you wish to do so. Any direct quotes from you used in the research will be anonymised.
You may also be encouraged to comment on parts of the research on which your participation has had a bearing and your comments may be used to refine parts of the work.

How will data be collected?

Audio only recordings of 1-1 interviews and focus groups will be made with permission which will be transcribed. If you would prefer your voice not to be recorded or are unable to engage in voice recording, you will be able to indicate this on the consent form below. Excerpts from online communities will only be used where these are freely available for view by all members of those communities e.g. on Twitter, so will not need to be stored using any offline methods.

How will the data which has been collected be stored?

All audio files and paper-based documentation will be stored in accordance with The Data Protection Act (1998) and, on change of legislation, in May 2018, in accordance with the new EU General Data Protection Regulation (GDPR). All files will be kept securely; audio files and computer records will be stored and accessed only via password protected devices.

How will the data which has been collected be used?

Content from transcribed recordings and online communities will be analysed to draw out significant themes and issues. This data will be included in an analysis contained in my thesis. Shorter sections, including anonymised quotes, may also be used to disseminate findings at conferences, in research papers or by digital means such as via websites or social media platforms. Contributions will be used for the purposes of this research thesis and its dissemination only. The work and its findings may also be disseminated by The Education and Training Foundation who are the sponsors of the work.

You will be provided with a copy of the final thesis on request to the email address below.

If you are willing to take part in this research, please read and complete the consent form on page 3 of this document. If you have further questions which need to be addressed before providing consent, I will be delighted to respond to these; you can contact me at lynne@realtimeeducation.co.uk

Thank you for taking the time to read this information and for your interest in this project.
Yours, with thanks,

Lynne Taylerson

Research Participation Consent Form Researcher: Lynne Taylerson

Title: Growing Concerns: practitioners' positions on engaging in professional learning in a deregulated Further and Vocation Education (FAVE) sector.

Participation in the Study:

I am over 18; I have read and understood 'Information for participants'. I am aware of the purpose of this research. I have been given the opportunity to ask further questions before signing this form. I may contact the researcher at lynne@realtimeeducation.co.uk if I need further information. My typed signature below confirms that I have agreed to participate in aspects of this study. I choose to **opt in** to aspects of the research as indicated below as I consider appropriate.

I …….. give my permission for my data as indicated below to be stored under the rules of the DPA/GDPR (as date appropriate) and used as part of this study.

I can withdraw from this study at any time and all of the data provided by me will be destroyed.

My preferred email contact for research…… Date……

I **opt in** and give my permission for the following data to be used in this research:

I agree (√)	**To the use of:**
	Audio recording and file storage for transcription purposes only of 1-1 interviews with me
	Use of generalised, thematic data from 1-1 interviews with me
	Use of my direct quotes from 1-1 interviews with me
	Audio only recording for transcription purposes only of focus groups/educators' networking/CPD events attended by me
	Use of generalised, thematic data from my contributions to focus groups/educators' networking/CPD events attended by me
	Use of my direct quotes from my contributions to focus groups/educators' networking/CPD events attended by me
	Use of generalised, thematic data from my participation in online educators' communities
	Use of my direct quotes from my participation in online educators' communities

Researcher signature: (to be completed on receipt)
I have explained the nature of the research and its use to the subject and obtained their consent to

participate. In my opinion the subject is knowingly and voluntarily giving informed consent to participate as indicated and signed above.

Researcher…… Date……..…

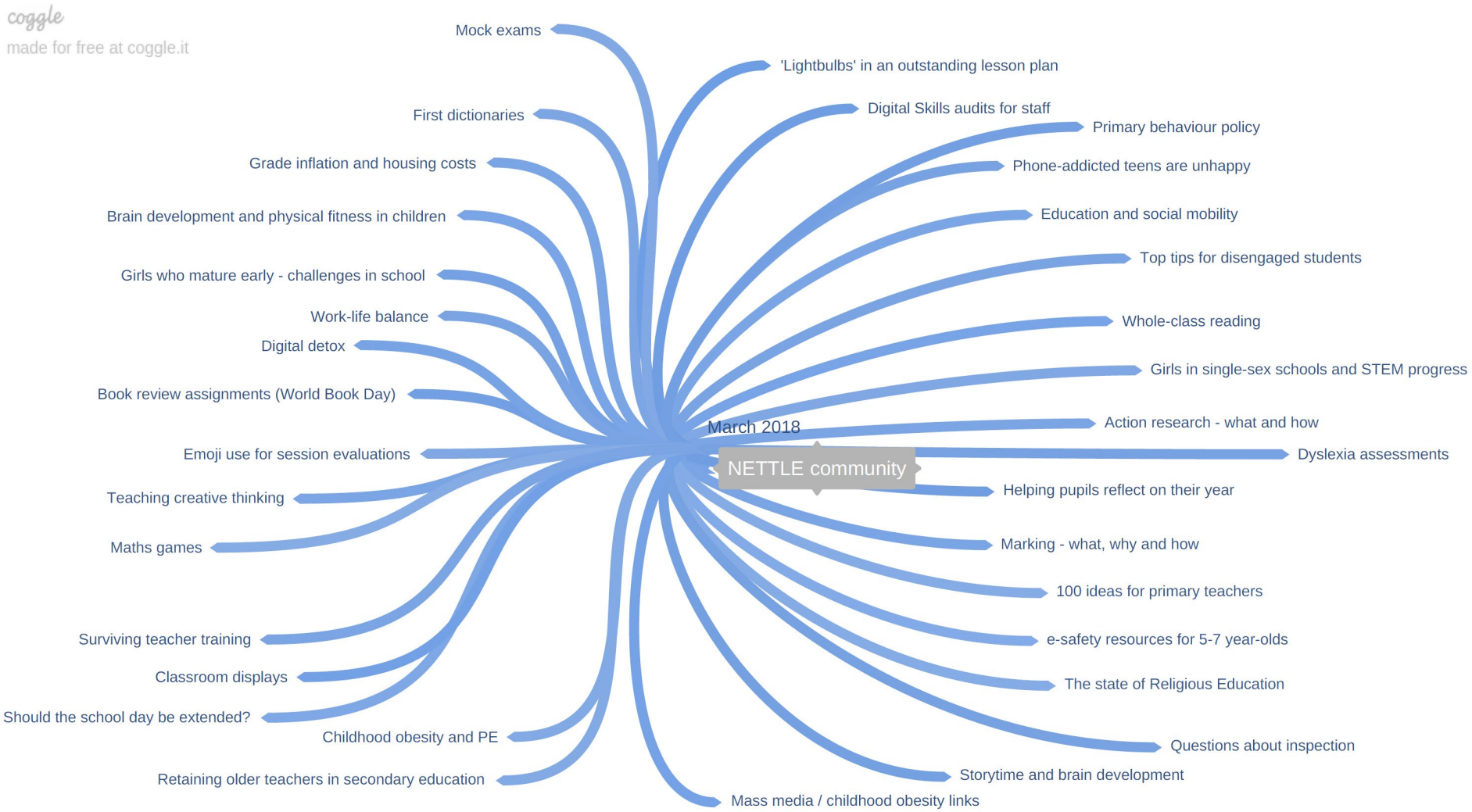
Appendix 3: Table comparing attributes of educators' networks used in the initial choice of SNA activity

Name and social media presence of network	**Active since**	**Followers as of 01/03/18**	**Number of posts since inception**	**New threads in month to 01/03**	**Average number of unique engagements with messages[1]**	**% of posts related to FE sector[2]**
Fern Twitter	2016	965	1,644	45	9	45/45 100%
Lily Twitter and Facebook	2015	709	600	11	8	11/11 100%
Nettle Twitter and Facebook	2010	65, 500	176,000	500+	2	20/34 59%
Ivy Twitter and Facebook	2014	2,217	687	25	14	25/25 100%

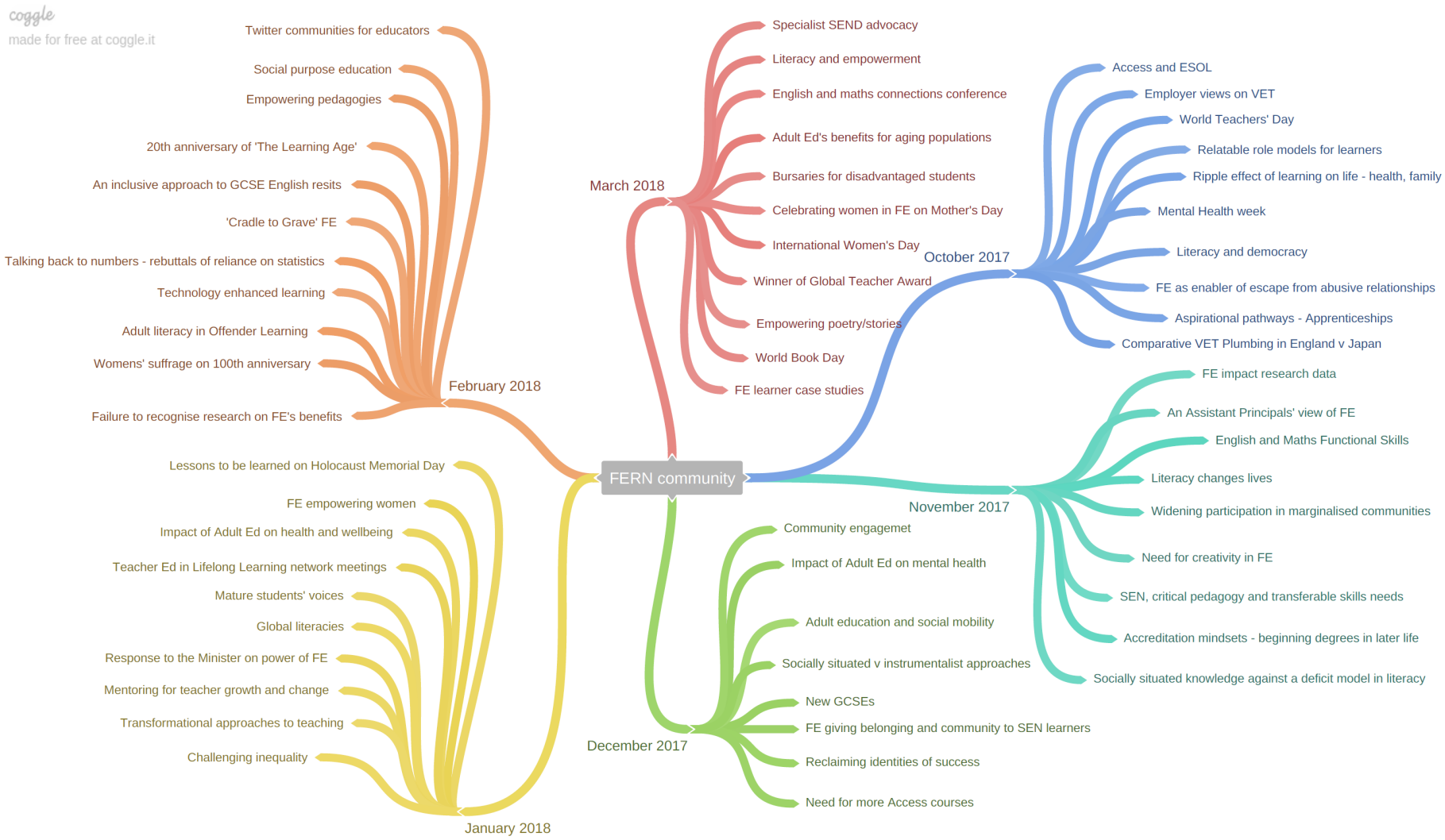
Appendix 4a: Coggle map of Nettle community activity (2 weeks)

[1] Average number of unique engagements with messages – the number of people sharing a post with their network or replying to posts in the period investigated

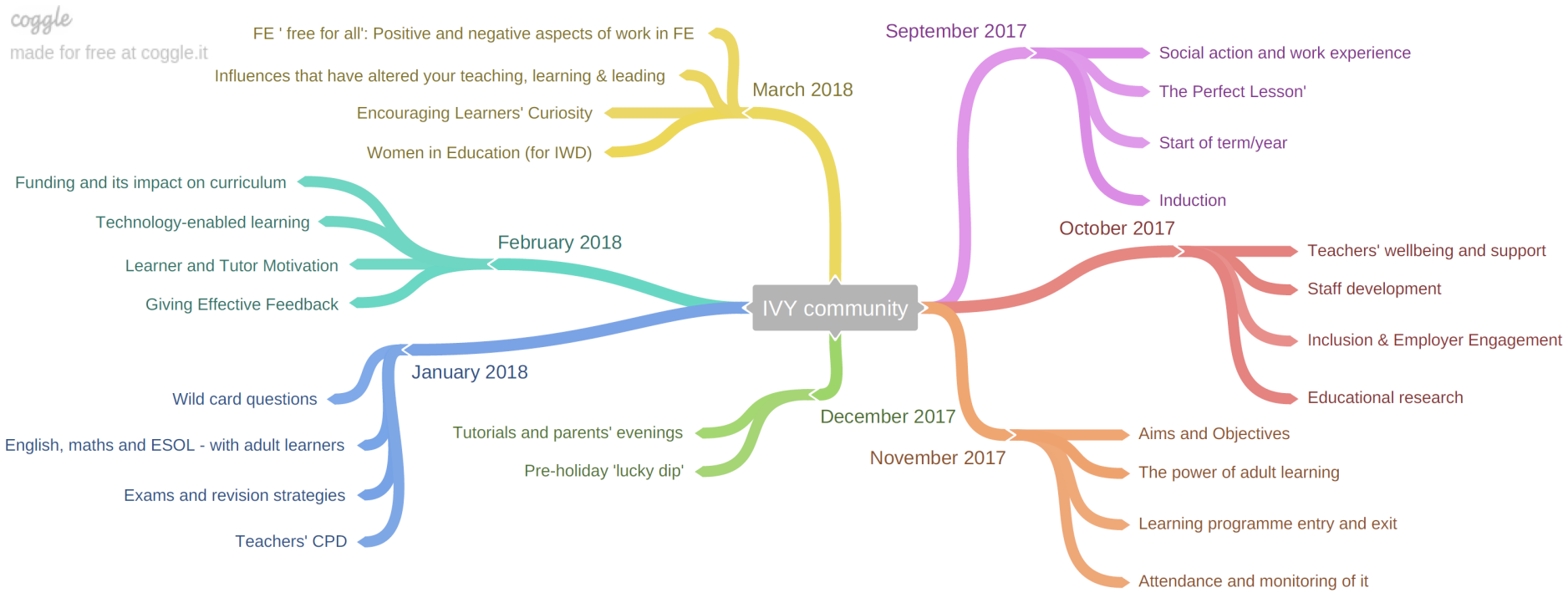
[2] % of message threads directly related to FE sector – discounts messages specifically regarding compulsory education e.g. SATs, nursery education, school uniform, assembly


coggle
made for free at coggle.it
March 2018
NETTLE community
Mock exams
First dictionaries
Grade inflation and housing costs
Brain development and physical fitness in children
Girls who mature early - challenges in school
Work-life balance
Digital detox
Book review assignments (World Book Day)
Emoji use for session evaluations
Teaching creative thinking
Maths games
Surviving teacher training
Classroom displays
Should the school day be extended?
Childhood obesity and PE
Retaining older teachers in secondary education
'Lightbulbs' in an outstanding lesson plan
Digital Skills audits for staff
Primary behaviour policy
Phone-addicted teens are unhappy
Education and social mobility
Top tips for disengaged students
Whole-class reading
Girls in single-sex schools and STEM progress
Action research - what and how
Dyslexia assessments
Helping pupils reflect on their year
Marking - what, why and how
100 ideas for primary teachers
e-safety resources for 5-7 year-olds
The state of Religious Education
Questions about inspection
Storytime and brain development
Mass media / childhood obesity links

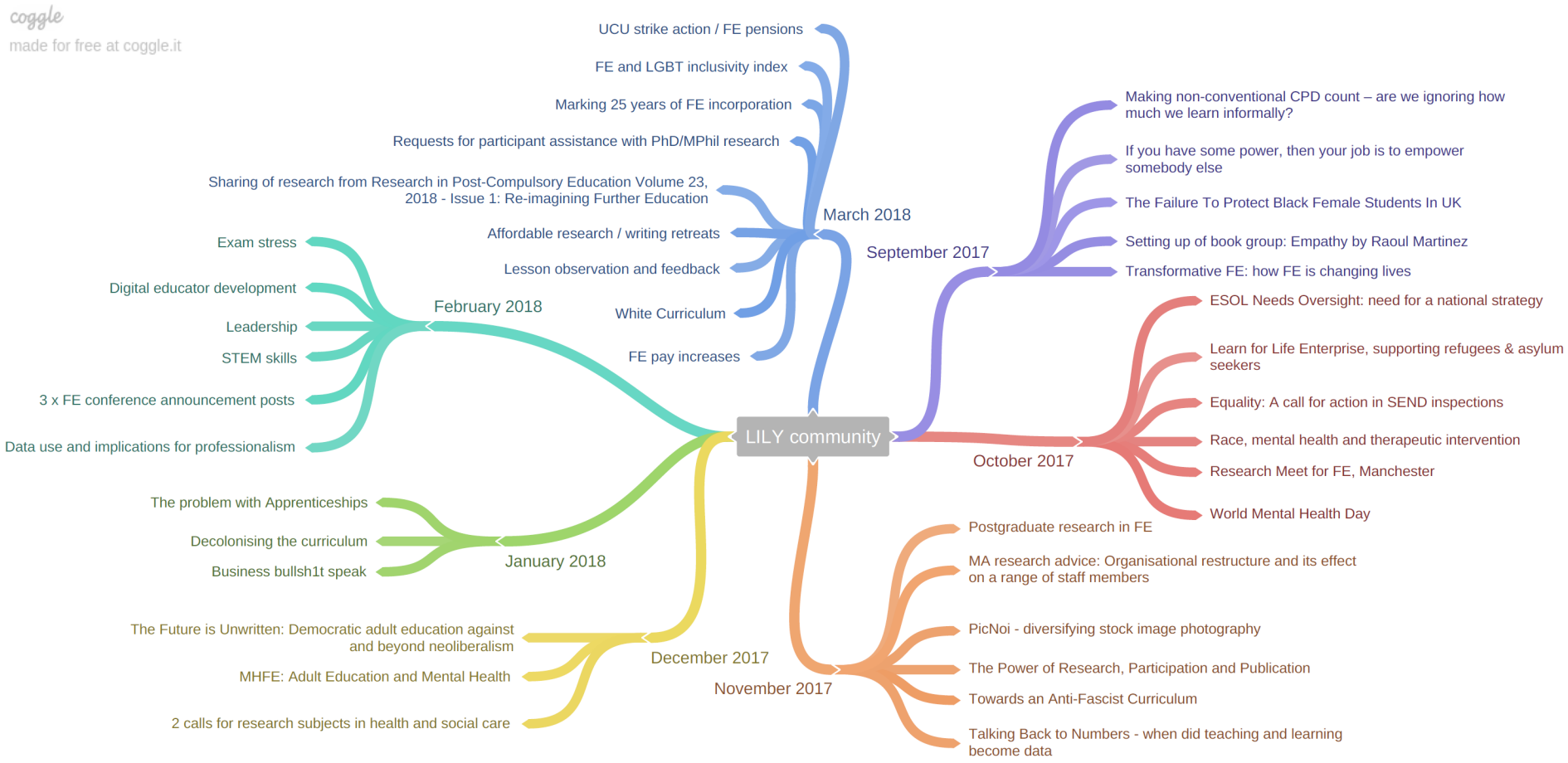
Appendix 4b: Coggle map of Fern community activity (6 months)



Appendix 4c: Coggle map of Ivy community activity (6 months)



Appendix 4d: Coggle map of Lily community activity (6 months)



Appendix 5: Guide questions for semi-structured 1-1 interviews with educators

One-to-one interview proposed structure, thinking points / prompt questions

Begin with conformation that all participants have been provided with the information/participation consent form and have fully understood and signed it. Give opportunity for further questions on it.

Briefly reiterate the broad aims of the research to set the scene.

It is hoped that this will mean that interviews can then move into exploration of these themes which may be explored using the following thinking points / question prompts though the structure of each unique interview may deviate from or expand upon these suggested prompts:

- How would you describe the difference between 'formal' and 'informal' professional learning/CPD? – brief response only required
- Which CPD opportunities do you currently participate in which you would describe as 'informal'? – this can include F2F and online informal networks.
- Have you found particular value in terms of professional development and identity in your participation in informal learning in comparison to more formal methods? If so, what?
- Has there been particular value to your professional development and identity in your involvement with any informal online networks? If so, which and how?
- Have you formally logged or documented your participation or formally documented the impact of your participation in informal learning – including online networks? If so, how?
- Which words (up to 10) might you use to describe informal online networks and/or your participation in them?

Additional prompt questions added following the netnographic analysis and categorisation of online dialogue themes (which are first outlined to the participants)

- What are your comments on the accuracy and validity of the '3-lens' categorisation of online dialogues? Do you broadly agree with the categories presented and why?
- Would you agree that there is an 'identity and voice' focus to the online dialogues you participate in?
- Would you advise amending or clarifying the 3-lens model in any way?