Evaluation of Participation in the Improving Lung Cancer Outcomes Project (ILCOP)

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Executive Summary

Background: The Improving Lung Cancer Outcomes Project (ILCOP) was a quality improvement project seeking to tackle variations in practices and outcomes in lung cancer treatment. Thirty lung cancer multi-disciplinary teams (MDTs) took part in a programme of activities that included: facilitated reciprocal peer review site visits; the development of Quality Improvement Plans (QIPs); and a programme of national MDT workshops and online conferences. The aim of this evaluation was to find out more about participants' views and experiences of taking part in the ILCOP programme of activities in order to inform efforts to ensure the spread and sustainability of ILCOP's work, and to inform future cancer-related quality improvement projects.

Methods: Individual telephone interviews were carried out with a total of 32 ILCOP participants from 17 of the participating MDTs. The sample included a diverse range of participants and comprised: Clinical Leads, Clinical Nurse Specialists, MDT Co-ordinators, other clinicians and managers. Analysis was based on the constant comparative method.

Findings: This piece of work sought to find out more about participants' views and experiences of taking part in the ILCOP programme of activities, in order to inform efforts to ensure the spread and sustainability of ILCOP's work, and to inform future cancer-related quality improvement projects. Participants' experiences of taking part in ILCOP were overwhelmingly positive – most aspects of the project were talked about positively and participants had enjoyed their involvement. The ILCOP core team was highly valued for its professional approach and for the invaluable work it did to organise and facilitate the project. Most participants felt they had been able to make at least some progress with implementing their QIPS, although some had found overcoming external obstacles difficult and not all were sure the changes would be sustainable in the longer term. ILCOP was regarded as an important factor driving the changes.

Discussion: ILCOP was an attractive proposition, and positive experience, for those participants interviewed. There are several important features which future quality improvement projects may wish to seek to emulate. Particular challenges around implementation of changes at the local level, and measuring the impact of these, may need further consideration. A number of key lessons are highlighted.

1. Background

In many areas of healthcare, substantial gaps exist between what evidence indicates is best practice, and what actually happens in the routine delivery of care. The Improving Lung Cancer Outcomes Project (ILCOP) was a quality improvement project seeking to tackle variations in practices and outcomes in lung cancer treatment. ILCOP was part of a wider Health Foundation-funded award scheme called *Closing the Gap through Clinical Communities* (CTGTCC), which sought to support clinical teams to close the gap between best known practice and routine delivery of care. CTGTCC award-holders were able to choose both their area of work (as long as there was authoritative best practice) and the interventions they would use to build bridges from current to best practice. The typical structure of the 11 projects participating in CTGTCC was one of a core (award) team that designed and directed the project and provided resources to other clinical teams in participating sites to carry out quality improvement projects.

1.1 ILCOP's quality improvement work

ILCOP sought to: identify and understand the reasons for variations in lung cancer outcomes across multi-disciplinary teams (MDTs) in England; apply established quality improvement methods to tackle specific problems in the delivery of care; raise the standard of multi-disciplinary care of people with lung cancer; and ultimately improve survival and quality of life in lung cancer patients.

The project aimed to improve quality of care in nine key areas, some based on benchmarking current best practice among high-performing hospitals in the National Lung Cancer Audit (NLCA), and others derived from National Institute of Health and Clinical Excellence (NICE) guidance or international comparisons. All 156 MDTs in England were invited to join ILCOP. Ninety-six expressed an interest, of which 80 were deemed eligible and 30 of these were randomly selected to participate. The remaining 50 trusts were designated controls.

To achieve its aims, the project used three linked approaches:

- Facilitated reciprocal peer review site visits, in which the 30 MDTs were paired with another team and visited each others' services;
- The development of Quality Improvement Plans (QIPs) led locally by individual MDTs;
- A programme of national MDT workshops and online conferences.

Facilitated reciprocal site visits are a form of peer review that involves clinical teams participating in two service site visits (one as host and one as visitor), and have been used in other quality improvement programmes (Aveling *et al*, submitted; Page & Harrison, 1995; Roberts *et al*, 2010). The visiting team is invited to provide feedback to the host team on areas for improvement in their MDT meetings and their NLCA and patient experience data, which can then be written up into a QIP. The facilitated reciprocal site visits are premised on an understanding of the importance of peer influence for quality improvement. MDTs were paired according to their strengths and weaknesses according to the NLCA. In order to reduce the chances of having a 'dominant partner' within a pair and to maximise the opportunities for learning from each other, MDTs were deliberately not paired 'good with bad'.

Following the peer reciprocal visits, each participating team drew up a Quality Improvement Plan (QIP), detailing the key areas the team proposed to focus upon. This was based on the visit, the comments of a Quality Improvement Facilitator (from the ILCOP team), and the suggestions of their counterpart team. It was at this point that a clear set of proposals for action was formulated. The QIPs were submitted to the ILCOP team for consideration and possible revision.

MDT workshops and online conferences (where all participating teams came together) took place throughout the process. These were used to introduce the project to the MDTs, allow MDTs to meet the ILCOP team and each other, and to encourage shared learning and networking across the lung cancer community.

1.2 Our previous work with ILCOP, and the rationale for this evaluation

We have been working with ILCOP since mid to late 2010 as part of our evaluation of the wider *CTGTCC* programme commissioned by the Health Foundation. As one of three purposively selected case-study projects, the ILCOP team has worked with us to facilitate an in-depth ethnographic evaluation of the core project team and a purposive selection of six MDTs (three pairs).

As part of their work to help ensure the spread and sustainability of ILCOP's work, and to inform future cancer related quality improvement (QI) projects, the ILCOP team has invited us to undertake further evaluation work with a wider range of participating MDTs.

1.3 Focus of the evaluation

The overall aim of this piece of work was to find out more about participants' views and experiences of taking part in the ILCOP programme of activities in order to inform efforts to ensure the spread and sustainability of ILCOP's work, and to inform future cancer-related quality improvement projects. This broad aim was broken down into specific research questions, as follows:

- Which features of ILCOP participation were most useful?
- Which features of ILCOP participation were most challenging?
- What aspects of ILCOP do MDTs think have worked well, and what could be improved?
- How has participation in ILCOP changed the way in which MDTs work?
- How have MDTs achieved those changes, or what has hindered them?
- What do MDTs believe has been the impact of their participation in ILCOP for their services, teams and patients?

2. Methods

2.1 Recruitment

Our initial approach to recruitment was to randomly sample ten of the 24 MDTs not involved in the wider *CTGTCC* evaluation and seek to interview two to three members of each (MDT Clinical Lead, Clinical Nurse Specialist (CNS) and/or MDT Co-ordinator). However, recruitment was slow and so the invitation to participate was opened up to all 24 MDTs.

The ILCOP team sent written information about the evaluation to each MDT, and asked members to reply directly to the evaluation team if they were willing to be approached for interview. An experienced interviewer contacted each individual who volunteered for interview in order to answer any questions and arrange a convenient time for the interview to take place by telephone. Participants were asked to complete a written consent form and return that to the evaluation team either by fax or email ahead of the interview taking place.

We recruited 32 participants across 17 of the 24 MDTs approached. The sample comprises: 11 MDT Clinical Leads; 4 other clinicians; 9 CNSs; 5 MDT Co-ordinators; and 3 managers. In terms of spread across the 17 MDTs represented in the sample, teams are represented by either one (8 MDTs), two (4 MDTs), three (4 MDTs), or four (1 MDT) participants.

2.2 Interviews

Interviews were conducted by telephone at a time convenient for the participant. A topic guide was developed for use during the interviews, drawing on data collected thus far with the six MDTs involved in the *CTGTCC* evaluation, our recent literature review of this kind of quality improvement work (Aveling *et al*, in press), and discussions with the ILCOP team. This topic guide was used flexibly within the interviews, with the emphasis on giving participants the opportunity to talk freely about their experience of participating in ILCOP. All interviews were audio-recorded (with participants' permission) and transcribed verbatim.

2.3 Analysis

A systematic and iterative approach to analysis of the interview data based on the constant comparative method (Glaser & Strauss, 1967) was adopted. Transcripts were open-coded, and key themes within the data identified through repeated close readings and review of open codes. A coding framework was subsequently developed and refined, before being applied to the full data set. Individual transcripts were compared and contrasted, and deviant cases identified and explored, in order to ensure a detailed understanding of how and why experiences of participating in ILCOP may have varied, for example, across different MDTs or different occupational groups. QSR NVivo 8 software was used to aid the coding, management and retrieval of data.

2.4 Ethical approval

As this study was concerned with staff rather than patients, NHS Research Ethics Committee approval was not required. We did, however, gain approval from the University of Leicester College

of Medicine, Biological Sciences and Psychology's Committee for Research Ethics Concerning Human Subjects (Non-NHS).

3. Findings

3.1 Motivation for taking part in ILCOP

On the whole, participants could articulate clear reasons why their MDT had opted to take part in ILCOP. Only a small number seemed less sure, and these tended to be more peripheral team members, such as managers, rather than core members such as the Clinical Lead, CNS, or MDT Co-ordinator. However, while these people were more peripheral they could be important in terms of enabling the implementation of planned changes (as discussed later) so it is important to ensure they are as engaged as possible and are clear about the motivation for their team's participation.

A range of motivations for participation in ILCOP were identified. One element underpinning participation was an interest in comparing their current performance against national standards or teams working in other locations.

> *I think we all have a desire to make our MDT be more efficient and make sure that, you know, we can kind of assess our practice against, you know, the sort of national standards, and I think everyone's looking to get more kind of surgical cases, the surgical resection rates up, and it's a desired focus to work out how we're performing against other equivalent centres and…nationally. (Participant 14, other clinician)*

In addition to gauging where they were in relation to others, some participants cited the explicit desire to improve their service. This was sometimes in quite general terms such as a desire to see if their MDT could run a little more smoothly.

> *The main reason was to try, sort of see if the MDT could run a bit smoother...and so if any ways it could be improved, I think that was the main, main reason why. (Participant 08, Manager)*

Sometimes this motivation was combined with a wish to help shake themselves out of a rut they feared they may have fallen into, and appeared to show a commitment to continual improvement and learning from others.

> *You tend to feel pretty isolated and carry on doing MDTs like you've always done…you just plod in your own, sort of, furrow, so it was really to get an idea of, see how other people's MDTs worked and see if there was anything we could do to improve our service. (Participant 17, Clinical Lead)*

In other cases, though, questions about motivation led to discussion of more specific problems they could see in their service and wanted to tackle.

> *We knew beforehand, and the project helped us with this, that our wait between the request for a CT guided biopsy and actually the biopsy being performed and discussed in the MDT was too long. (Participant 19, Clinical Lead)*

Those who went into the project with changes in mind that they wanted to make, framed participation in something like ILCOP as a possible way of raising their profile within their organisation and thereby helping to push those changes through.

Participating in a quality improvement project gives you a bit of a stick to use to drive change in your organisation…because it's going to be studied objectively and looked at…by an outside agency is always a drive to sort of look good, I suppose, so it's a way of getting things done effectively and getting people to do things, you know. It's quite a powerful way of effecting change, bit more power than you just trying to start things off. (Participant 12, Clinical Lead)

There were also features of ILCOP itself that made participants view it favourably, and made it something in which they actively wanted to become involved. These included the overall approach of the ILCOP team, the methodology that would be used, and the fact that it was associated with the Royal College of Physicians (RCP). Locating improvement activities within well-established, well-regarded professional structures therefore seems to act as a form of "branding" that reduces the risk or threat associated with joining the community by conferring credibility and legitimacy.

I think, well I think we're always keen to improve, keen to analyse what we do to try and see whether we can do it better and I think the comfort of going to another hospital to see another team do it was really interesting to us. (Participant 04, Clinical Lead)

Because it's got backing and stamps with lots of, you know, the Royal College of Physicians' cancer action team, lots of people had officially said this was OK and sponsored it and it looked like a reputable study. (Participant 01, Clinical Lead)

Some participants saw getting involved in ILCOP as giving them the opportunity to exercise a sense of professionalism. Issues that emerged as important here included being seen to take quality of care seriously, and working as part of a community of professionals.

I think it sort of advertises the fact that we take things very seriously and we're trying to evolve and improve the service, and it, it does, it does make you think about the MDT rather than as a sort of a get together and a sort of…you know, a general meeting of people, and think of it more as a, a fairly serious meeting with, you know, with a set agenda and also working to a certain set of guidelines. (Participant 14, other clinician)

You can liaise with other MDTs and be more confident in yourself that the approach you're taking is correct then [that] helps you to become, you know, to be more professional because you feel that you're reflecting a professional body rather than, this isn't just your view of what you should do, this is what people in general are striving to do. (Participant 03, Clinical Lead)

Some MDTs appeared to have a 'culture of improvement', meaning that their default position appeared to be to view initiatives of this kind positively and seek to participate in them.

I think first of all when we're approached with things like that in general, we will try and look on them favourably or positively. You usually get considerable benefits from taking part in such audits and projects, particularly on a national level and even on the most basic level of just observation of what other people do, learning about what other people do and trying to disseminate ideas and pick up good practice from other people. So we would have had a

natural tendency, we usually volunteer to take part in things like that if we think it's, you know, a positive thing to do. (Participant 06, Clinical Lead)

3.2 Experiences of taking part in ILCOP

Overall, participants' experiences of taking part in ILCOP and the project's programme of activities were very positive. There were, however, some project activities that were viewed less positively than others and participants put forward suggestions for how some elements could have been improved.

Expectations of ILCOP, and previous QI experience

When asked to reflect upon whether their participation in ILCOP had been as they had expected, many participants reported that they had been a little unsure about what to expect when they agreed to take part in ILCOP.

I can't say that I actually had any idea of what it was going to be, so I think we probably, as a team, we probably went into it quite blindly and that was OK, it worked OK, it wasn't a problem. (Participant 09, CNS)

DO YOU THINK PARTICIPATION IN ILCOP'S BEEN AS YOU EXPECTED AT ALL?

I can't answer that because I don't know what it was going to be, I didn't, I didn't know how it was going to be, so you know, I, I had no preconceptions. (Participant 20, CNS)

This may be because most participants (approximately two thirds of those interviewed) reported having no experience of other QI work previously. In these cases, even if given information on the kinds of activities they would be required to undertake, participants could not always easily translate this into what this would mean in practical terms.

SO HAS THE PARTICIPATION IN ILCOP BEEN AS YOU EXPECTED IT TO BE?

Yes, I think so, I mean, obviously having not done it [QI work] before, I wasn't sure what to expect, but it hasn't been to me particularly onerous really and I think I've got quite a lot out of it, yeah. (Participant 16, CNS)

WAS IT AS YOU EXPECTED OR NOT?

Um, I don't know, I don't think I had any huge expectations, to be honest, because I've not done a QI project like this before. (Participant 12, Clinical Lead)

Those that did feel they had some QI experience talked about a range of different types of activity. One of these was local initiatives within their Trust.

There's been sort of local, you know, hospital based initiatives and little things that we've tried, you know, to try and tweak the meeting and get the list done in a timely way…but nothing of this scale, nothing national that I've been involved with anyway (Participant 14, other clinician)

The national peer review scheme was mentioned by some, perhaps surprisingly few, participants as another example of QI work they had been involved in before. While comparisons were made between the national peer review scheme and the ILCOP peer review model (as discussed below), the national scheme was not generally regarded as a QI activity by participants.

> *No, the only thing we'd really had obviously were the peer reviews, so anything we'd taken onboard from that we'd tried to improve, but otherwise we hadn't, no. (Participant 17, Clinical Lead)*

There was also some talk about the routine QI work that clinicians conduct on their own practice, and a small number of participants reported having some kind of more formal QI training.

> *Well surgeons in particular always do their own quality improvement if you like so we're always – cardio-thoracic surgeons in particular you'll be aware from [place 10] and all the rest of it – we have regular audit of morbidity and mortality meetings. (Participant 13, other clinician)*

> *I did the NHS Institute LIPS course, Leaders and Patient Safety, which has got quite a lot of, kind of, QI stuff in it. I've done some other little bits and pieces and I subscribe to the IHI, kind of, mailing list and things like that, so I wouldn't call myself an expert but I've got more, kind of, experience than probably most people have. (Participant 18, Clinical Lead)*

Participants' evaluations of different elements of the ILCOP programme

Reciprocal peer review

The reciprocal peer review visits were the most positively reviewed element of the ILCOP programme of activities – one participant talked about these as being the 'jewel in the crown'.

> *I think the reciprocal peer review was the jewel in the crown actually...I mean that was the thing that was probably the most valuable. (Participant 01, Clinical Lead)*

Participants seemed happy to accept feedback within this approach because it was coming from people who did similar jobs and who were facing similar challenges, rather than from others who were external to either the specific clinical setting or who were not clinicians at all (Freidson, 1988). Peer-based learning may be of an especially valuable kind, as it is likely to be particularly influential (Dopson *et al*, 2002; Parboosingh, 2002) given that people are more likely to change their behaviours when they see liked and trusted peers doing the same (Dube & Wilson, 1996).

> *I really just enjoyed the sense of team spirit of the whole thing which sounds a bit silly but just sitting around with other people who face the same challenges and the same financial pressures and hearing how they were dealing with it. (Participant 04, Clinical Lead)*

> *So the huge benefit of ILCOP has been the fact that your peers who have the same problems that you have, have gone to your place and had a look at it so you're going to listen to what they point out and say rather than some external guy who's never done thoracic surgery who's now coming down to talk down and tell you. (Participant 13, Other Clinician)*

Being able to actually observe how others conducted their MDTs, as well as receive feedback from them, was important. Being able to see another team in action in real time and compare the two different approaches brought things to life in a way that simply hearing about the others team's way or working would not.

> *When you actually get across and see another team doing their, their normal MDT, I think most of the useful ideas come through that. (Participant 14, other clinician)*

Even if feedback from the paired team contained no surprises, it seemed useful to have weaknesses or shortcomings confirmed by others so that the team felt more confident about beginning to address the issues. It could be especially useful to have current weaknesses confirmed by the paired MDT if there was a dissenting view within the home team about what was and was not an acceptable standard of service. In the example below, a Clinical Lead describes how a discussion with the paired team about a particular intervention appeared to disrupt the local radiologist's belief that their time lag was acceptable.

> *I've had battles with the radiologist about CT guided biopsies and I was saying [that it was a problem] and he said "what's your wait time?" and I said "oh, they can be up to about 2 or 3 weeks" and he just said "wow, that's really long!", in front of the radiologist who then, and it was quite interesting, so someone outside coming in and saying that, I've been saying this for years, but someone else saying that actually they suddenly went "well, right, well what's yours?", and she said "well we can get it within a few days". (Participant 19, Clinical Lead)*

Comparisons between the ILCOP approach to peer review and the national scheme were generally favourable. Those participants who explicitly compared the two tended to characterise the national scheme as having become something of a 'tick box' exercise that focused predominantly on whether particular targets had been met. In contrast, the ILCOP approach was regarded as a more positive and more productive process.

> *We've just had external peer review here and I've always been a fan of peer review but once you've seen the two, how the two different processes work, I actually think the ILCOP's a lot better....what we found with the national peer review now, it's become, unfortunately, a lot more tick box…however, when we had the visits from [paired team], it was really good because it was quite an informal type, sort of, setting, but you had all the [paired team] team with us and then our team there and the calibre in the discussion was a lot more meaningful, I thought, and they were talking about, I mean, it was a definite peer on peer. (Participant 34, Manager)*

> *National peer review is done in a very, sort of, I wouldn't say a punitive way, you know, "have you done x% of this? Have you done x% of that? Why not?" Whereas this was, you know, I think because of the construct of the project, we went into it in a constructive way. I mean, I think interestingly, I mean, I've only just thought about this right now actually, one of the things that attracted me about it was that it was funded by the Royal College of Physicians and therefore you thought this was, you know, a non assessing environment and it was, you know, true quality improvement by a body that I believe in, you know, and I think that made a difference. (Participant 19, Clinical Lead)*

The approach to pairing teams appears to have been important in making the peer review process a useful and productive one for participants. The ILCOP team deliberately avoided allocating the peer review pairings on the basis of matching 'good' teams with 'bad' teams – instead doing so on the basis of teams' differing results across headline indicators from the NLCA . Our previous work with the ILCOP team as part of the CTGTCC evaluation has already highlighted the importance of pairing teams in this non-hierarchical way (Aveling *et al*, submitted), and this current work has reinforced that finding. An additional important feature of the pairing approach that participants raised was being paired with another team from whom they felt sufficiently detached, rather than being asked to work with, and critique, near neighbours. This latter approach might have been a little too close for comfort and may have limited the degree of openness that could be achieved.

> *It was done by people that we didn't know, and what I mean by that is, I think if it was done by the hospital next door who, for us, is [hospital name], we may have been a little bit more reserved and a bit more defensive, whereas…we didn't know these guys… I think we did the same for them, actually, we were very frank with them. (Participant 19, Clinical Lead)*

Interestingly, there was also an element of getting to know your own team better by taking part in the peer review process as part of a team.

> *It gave us the chance that you never ever get when you are in the day to day here and there, you know, to actually, you know, sit on a train in close capacity for an hour and a half or whatever it was, and put your heads together, and the same on the way back, it was like a little debrief. (Participant 15, CNS)*

> *At the end of the day if you have a break from the grind of daily activity and sit down and discuss your mutual problems and that helps team bonding. (Participant 13, Other Clinician)*

There were a few negative comments about the reciprocal peer review process. One participant felt that his team did not have sufficient time to prepare for the visits and that the ILCOP team were perhaps new to the process and may have been more effective at organising and facilitating the sessions with more preparation and experience. Participants from one, quite large, team felt that their pairing had not been optimal and that it would have been better for them to have been paired with a hospital of a similar size rather than one a good deal smaller. For the team concerned, this mismatch in size appeared to limit what they thought they could usefully learn from the other team.

Development of QIPs

The next stage after participating in the reciprocal peer review process was for each MDT to develop a number of QIPs that they would then implement. Participants generally reported finding it quite straightforward to identify what issues they would focus on for the QIPs. As stated above, many participants felt they came into ILCOP with ideas about what areas of their service needed to be improved and participants found the peer review visits a productive source of ideas, too.

> *I think you already know which areas of your service could be developed and then when you then hear from other MDTs how they work theirs, that identifies which bits you feel are, sort of, quick fixes or medium term fixes or unable to be fixed within your resource sort of thing, so it was fairly easy to identify what we wanted to do. (Participant 10, Clinical Lead)*

Developing a formal QIP was generally seen as a positive exercise, which helped to keep them on track.

> *It definitely focuses you, and it also makes me think well this is not just a sort of a departmental aspiration, but there are some sort of, you've got a defined objective, how you're going to achieve them as well, and given some sort of timeframe...I think it did focus us in terms of the, you know, planning some of the improvements, and what we should do and what's realistic more to the point. (Participant 14, Other Clinician)*

There was some evidence though that some participants found the process of developing a QIP more challenging – moving from identifying the issue they wished to tackle to a specific plan for how to do so could be challenging. Sometimes this was because changes they were experiencing at the local level meant that they could not begin to think clearly about the mechanisms they would use to try and make the improvements they had identified were needed.

> *We identified three areas to try and, to look at, and then we've, sort of, been involved with trying to get them up and running. It's been a bit hampered because we moved hospitals, so it all happened at the wrong time so everything's taken a long time…because we moved sort of December 2010 so it was just after the initial MDT reviews of each other and then designing what you wanted to take forward. (Participant 10, Clinical Lead)*

Other reflections on the QIP development process came from a small number of participants who, in hindsight, felt they might have preferred to take a little more time over it to make sure they got it right. Being unfamiliar with quality improvement work in general, and the process of developing a QIP in particular, meant that participants could be a little unsure about what a 'good QIP' looked like, and did not realise until too late that theirs was perhaps not as strong as it might have been.

> *I think two [of our QIPs] were extremely useful…but I actually do think one of them really wasn't a very good QIP for us and I probably should have just been more vocal, but because I didn't quite understand the process and we were the first visit…that [QIP] seemed like a good idea at the time, it did seem like a good idea at the time, but a couple of weeks afterwards it seemed a bit like a rubbish idea actually, doing an education meeting and I'm thinking we could have done better than that. (Participant 06, Clinical Lead)*

National MDT meetings and workshops

The national meetings and workshops were a highly valued element of the project, and appeared to contrast well with the paired peer review element as some participants really valued the additional breadth that the national events brought in terms of the number of other teams present. Participants seemed to value the opportunities to exchange advice and ideas on a range of issues, not just the specific QIPs their team had chosen to take forward, and these wider discussions encouraged participants to think of improvements they could implement in the longer term.

> *WHAT'S BEEN MOST USEFUL FOR YOU?*
>
> *Erm, probably the second meeting in [place] where there were presentations from different MDTs and opportunities to discuss with lots of different MDT leads different issues and,*

again, you know, taking that forward, being able to take those ideas forward, making contacts, finding out what other people are doing and how you could use that for your service and develop it. (Participant 10, Clinical Lead)

What I found better [than the reciprocal peer review] were actually the workshops afterwards when we went back and met quite a lot of other different MDTs and recognised points and issues that probably we hadn't done when we'd had the teams just reviewing each other. (Participant 17, Clinical Lead)

The opportunity to learn from others was important not just in terms of helping participants identify *what* to do, but also to learn from others *how* they had been able to make it happen by providing a forum for sharing good practice and tacit, often non-clinical, knowledge (Currie *et al*, 2009; Bate & Robert, 2002; Freidson, 1984). Seeing success elsewhere and hearing about others' experiences of making changes was especially important in convincing people that aspirations could turn into reality, and that the achievements of others was evidence that change was possible.

I've just emailed another chest physician for instance a whole bunch of data, stuff that she can use to put her business case forward, so we've shared business cases and data which is free to share and then she also emailed me back information about [some] IT software. (Participant 01, Clinical Lead)

It appeared important that this sharing of successes and learning from others took place face-to-face. Being able to hear about it from the people involved in doing it brought it to life and made it more tangible than, for example, reading a report or seeing some slides.

You can look at a presentation and you can think yeah, that's really good but actually hearing about how they did it, you know, all the pitfalls come out and, you know, well actually this worked really well, we tried that, it didn't work, blah blah blah, so it's, yeah, it's so valuable talking to people face to face, and I know it's difficult to try and get people out of the workplace, it's a luxury, isn't it, to go and have a half day somewhere to exchange views, but it's just brilliant. (Participant 20, CNS)

An important element of the national meetings and workshops was the opportunity to meet with others who had a similar role within the MDT as participants appreciated being able to network with people from their own occupational grouping at some points in the process.

The workshops?.....Yeah, very useful and again I think it was useful to talk to other people and I think that the facilitators made sure that you met with the multidisciplinary team but that you were also, had some time with your own speciality because it's very important to speak to other nurses because they've had to handle exactly what your problems are and it's always very useful, it's even just to realise that everybody's got the same problems as you, really. (Participant 16, CNS)

Online conferences

While these worked well for some people who appreciated the time saved in not having to travel to meetings, they were perhaps the element that participants overall found least useful. While in

principle, they offered a useful way of keeping in touch with other MDTs in between face-to-face meetings, in practice many participants found them a little daunting and difficult to engage with. The technology caused problems for many – either because there were problems setting them up or because people were easily discouraged by technical hitches. Even those who ultimately found them helpful spoke of a period of familiarisation being necessary.

> *I tried to log on and I couldn't and I just thought, and I'm just being really frank with you, I just thought 'oh I can't be bothered with this right now', I was clicking away for about five minutes, it couldn't work. (Participant 19, Clinical Lead)*

> *At first I found them a bit bizarre, I'd never done anything like that before, but once I got used to understanding how it works and be aware of it, I found them really helpful. (Participant 05, CNS)*

There were some participants who gave this kind of activity a try, but did not find it very helpful and so abandoned it. Often this was due to a lack of turnout.

> *There was one that I took part in which was relevant for us but there weren't a lot of participants there, I mean, the point about a teleconference is that you actually need quite a lot of people to get a major discussion. (Participant 06, Clinical Lead)*

Those participants that never really engaged with the online conferences spoke of scheduling problems preventing participation, and how they were more difficult to prioritise than face-to-face activities.

> *No, it's really difficult to participate in those [online conferences], it's always, they seem to have been on a Wednesday, which is our lung cancer clinic and it's our busiest, busiest day, it's literally a full day clinic, so there's just no availability for us to do that. (Participant 11, MDT Co-ordinator)*

> *The teleconferences were supposed to be obviously easier because you don't have to travel. The problem with that is because you don't have to travel and because there wasn't so much advanced notice, it was difficult to stop your normal day to day work. (Participant 01, Clinical Lead)*

Getting things right first time was important as, sometimes, if one person from an MDT tried to join in with a teleconference, their negative experience could spread quickly to other MDT members and put them off even attempting it.

> *[The online conferences] were always on a day when I was in the middle of clinic. In addition to that my coordinator had done one and found it enormously frustrating and a complete waste of time, so, I thought, I was less motivated to try and make time to join. (Participant 20, CNS)*

Facilitation and co-ordination by the ILCOP team throughout the project

Participants seemed to value highly the ongoing presence of the ILCOP team throughout the project, and their presence was helpful in a range of ways. An important task they were able to undertake

was the administration and logistical planning required to make activities like the peer review visits a reality.

> *Well they were bringing us together and saying what days can you do it, what can't and, sort of, trying to plan your days when we got there and they were very supportive with trying to, sort of, bring data along, so we didn't have to do all the trawl ourselves and things like that. (Participant 17, Clinical Lead)*

The balance the core team achieved between encouraging progress but also letting the teams focus on issues that were important to them was valued. Participants felt the facilitators struck the right balance between keeping things moving and helping the teams to make their own improvements that, hopefully, would be sustainable in the longer term.

> *You know, gently coercing us to come out with action plans and things that we should do and timetable and things, so but they weren't in your face but they, sort of, put just enough arm pressure on you to, sort of, make sure it got done. (Participant 17, Clinical Lead)*

> *I have to say that the team have been absolutely spot on all the way through, they've been superb, they've been very supportive, they haven't tried to push any ideas… It felt like the project team were trying to help you improve rather than trying to improve things for you. (Participant 06, Clinical Lead)*

Guidance, support and feedback from the core team seemed to be particularly valued at key points in the project, such as the peer review meetings and the development of the QIPs that each team would focus on throughout the course of their involvement. For many, these were new types of activities of which they had no prior experience so guidance on how to approach them was valued.

> *[I] found it [feedback on QIPs] very constructive and helpful and it helped guide us on where to go and if we put any of our plans together and sent them down, which obviously you had to do, you got very constructive feedback on what they felt we needed to do. (Participant 05, CNS)*

> *The day [of a peer review visit] was structured well, we'd got objectives, we knew where we were going with it, obviously it was new so anything that's new you always feel, you know, a little bit nervous of because, you know, you don't know what to expect, but [ILCOP facilitator] was there, she put us at ease, there was clear objectives, there was clear structure to the days, so yeah that was good. (Participant 07, CNS)*

In addition to input from the core team at these typically quite early stages, participants from MDTs which received a subsequent visit by the ILCOP QI facilitator appeared to value this later input. Re-establishing contact on an individual MDT level could be a good way of making sure the QIPs they had developed remained a high priority, and did not lose momentum once the initial enthusiasm and commitment was tested by competing priorities and demands.

> *She [ILCOP facilitator] refreshed us…that's the only way I can describe it, because you can, you know, we're all enthusiastic, we're all motivated, but you can start going back into, not a decline, yes, a decline, you know, kind of the day to day running of the service, and you know,*

everybody's working long hours, so things that aren't a huge priority at that time start to kind of take a back seat…so [ILCOP facilitator] actually coming along got us to kind of sit up and take note again, you know, and kind of give us a bit of a boost if you like. (Participant 15, CNS)

Participants also valued the fact that the ILCOP core team was external to any particular MDT and therefore had the 'bigger picture' view of what all the MDTs involved were doing. As a result of this they could suggest links between teams attempting to implement similar changes, or who were encountering similar problems. While teams could make connections with others at the national meetings, having an idea in advance of who it would be useful to approach was helpful in allowing them to make the most productive use of these kinds of events.

And they [the ILCOP team] pointed us towards other Trusts that were doing similar things as well. It was all, the feedback was more indirect and pointing us in the right direction. (Participant 12, Clinical Lead)

She'd [ILCOP core team member] obviously picked up on the conversation that this team is in [place] and that I'd worked at [place] and she said "oh you might know them already" so actually just things like that are quite useful and actually on the back of that, I'll probably phone my friend at [place] and say "hey, why are you getting confirmation rates so high?"… but [ILCOP core team member], she knows and she has, you know, access to the figures and I just think it's somebody else thinking, who's a little bit removed from it, so very useful. (Participant 03, Clinical Lead)

The ILCOP core team's facilitation of meetings and events seems to have been particularly appreciated by participants for the way in which it could neutralise any potential awkwardness or confrontation. In face-to-face meetings between different MDTs, whether the peer review visits or the wider national meetings, having the ILCOP team facilitating and keeping things on track was experienced positively.

IT WAS HELPFUL TO HAVE SOMEBODY FROM THE ILCOP TEAM THERE AT THE RECIPROCAL VISITS?

Yeah...it, it sort of made it, it, it took away a big part of the, and I use this word very loosely, the blame culture, you know "god, why are you doing it like that?" Well actually it was quite good to have [ILCOP facilitator] there to sort of, it made it a bit more official and a bit more, a bit less them and us. (Participant 20, CNS)

Other aspects which could be improved, or had been challenging

Some participants had found that getting all the relevant people from local sites involved, such as managers, pathologists, and IT staff had been difficult in many cases, but this was increasingly regarded as important if progress was to be made.

I think in theory yes because it's a national drive and it's from the Royal College of Physicians and there's this, there's that and the other and we all want to do it but when it comes down to it at the end of the day, that never feeds through to the operational managers in the Trust

who demand X of clinicians now....That's going to be a big –that is currently a big problem across all aspects of this type of work. (Participant 13, Other Clinician)

If these kinds of people, who typically work across a Trust more widely and are not lung cancer MDT focussed, could have been more involved in the ILCOP programme of activities it could have helped to build links within each Trust and smooth the way for future implementation work.

I don't know if other people have had IT issues but certainly it's a major thing for us and I guess everyone's moving to, sort of, electronic capture of data so the involvement of a responsible person from IT might have been useful, rather than…getting a different face every time. (Participant 17, Clinical Lead)

These kinds of people, being external to the core MDT, could also have contributed a useful, contrasting perspective.

Well I think if they'd [pathologists] have been in, they might have come up with some different ideas about how they feel the MDT is, it's slightly different for them because they just turn up to an MDT and it's put on a plate to them, we discuss the patients and then they go away, they haven't been involved in deciding which patients are going on there and collecting all the notes, the x-rays…so maybe they don't think about what goes on in an MDT or the preparation behind it and it might have brought them, you know, some realisation of that and then maybe put some feedback in. (Participant 17, Clinical Lead)

The sustainability workshop, which took place towards the end of the ILCOP programme of activities, received some mixed feedback (although it is possible participants focused on this aspect as the most recent event at the time of interview). Some participants valued the session and would have liked it earlier in the process, while others did not really see the point of it at all. While not clear from the data available, it may be that this type of event was more appreciated by those who were more 'in tune' with the QI principles underpinning the ILCOP programme. The second extract below certainly seems to suggest that the idea of actively planning a change, measuring its impact, and ensuring it is sustainable is above and beyond what is required – instead preferring a more 'gradual metamorphosing'.

I just felt maybe we should have had the sustainability at the beginning. It's only because it gave us all the tools about starting projects when we'd already done our project. (Participant 34, Manager)

The last workshop, that sustainability and what have you, I'm not sure very many of us got much from that really because when you make us do a service improvement, or look at doing something differently, quite often it's a sort of, a gradual metamorphosing of the way you work...and I'm not sure many people sit down and think "ah, I'm doing something differently, I'm going to do the sustainability exercise". (Participant 20, CNS)

A small minority found the early, more introductory, activities a little basic as they felt were starting considerably further down the road than most of the other participants.

WHAT WAS IT ABOUT THE INITIAL WORKSHOPS THAT WASN'T, DIDN'T QUITE WORK?

No, I'm not, not that it didn't work, it's just for me personally it wasn't so useful because I, kind of, already knew about the background to the project and why we were doing it and I already had quite a bit of quality improvement background and those first few workshops weren't, for me, anything particularly new. (Participant 18, Clinical Lead)

However, this minority did acknowledge that these more introductory sessions were useful and important for the other participants in terms of introducing them to the ILCOP work, making the case for why a project of this kind was necessary, and explaining some of the QI tools and techniques that would be used. The key point here perhaps is recognising the need to make sure that those who are more advanced are not alienated while early activities build up those who are starting from a lower benchmark.

While many participants reported they were making connections with members of other MDTs and pursuing these outside of the ILCOP programme of events, some expressed a wish for more ILCOP-facilitated follow-ups, particularly with their paired team.

And unfortunately, we haven't actually had, or I certainly haven't had, any other feedback from them [the paired team], because obviously we're all really busy getting on with our jobs and what have you, it would have been nice actually to have another reciprocal visit because obviously timescales and, you know, people's workloads, it just hasn't been possible but, you know, they could, you know, potentially see how we've improved and what have you and we can them. (Participant 11, MDT Coordinator)

In addition, some participants would have liked easier access to all the QIPs different MDTs were implementing, the strategies they were using, and the lessons they were learning. While some sharing of this material was possible within the national meetings, these were sometimes a little rushed and material to take away may have been a helpful addition.

I guess learning more about the quality improvement plans from other Trusts probably would have been even better…it was quite difficult to scrutinise all those quality improvement plans with the people involved, we didn't all stand up and discuss our plans with each other as a matter of course…I guess you might have said there were too many to look at them all. (Participant 01, Clinical Lead)

3.3 Impact of ILCOP

The changes participants believe they have made

On the whole participants reported that the QIPs developed by their MDT were being progressed, and that they were meeting with some success in their attempts to implement the changes they wished to make. While some teething problems were mentioned, participants tended to talk positively about the QIP approach as providing a valuable focus and a framework to take things forward. However, what success looked like or how it was being understood was not always clear, and participants sometimes appeared to 'oversell' the impact they had managed to achieve when compared with their original QIP. For example, one MDT had planned to increase recruitment into clinical trials but later talked about success more weakly in terms of raising the profile of trials within

the MDT.

> *It was probably a QIP that we didn't think we were going to be able to do a lot about, however, we have made progress so I was wrong!...I don't think we've got a lot more [patients] recruited in clinical trials but we have raised the profile of clinical trials massively within the MDT. (Participant 06, Clinical Lead)*

Sometimes the changes that participants talked about were more general than their planned QIPs, and it was not clear to what extent they would be able to collect any data on these or measure their impact in any meaningful way.

> *So it led to sort of general improvements in how the MDTs work, so specifically we changed a few things, the first thing is we got somebody chairing the meeting, so I started chairing the meeting, just to make sure it flows along and just keep it going, because there tends to be a lack of focus in direction, that was fed back to us so that's made a difference in terms of making sure people are pretty focused, know what they need to talk about and that we get through all the patients in a reasonable amount of time. (Participant 12, Clinical Lead)*

> *We have changed the layout of the room, you know, after that we had, sort of, three weeks where we had three different layouts and we had a little straw poll and we did the majority one, so I think the room works much better now. (Participant 19, Clinical Lead)*

How easy or difficult it was to make the changes

Most of the changes reported as being successfully implemented do not appear to have been particularly problematic from participants' point of view – perhaps just as having a few teething problems and needing some ground work to be done.

> *We formulated a plan for doing it, required various things like computers and so on, so there was a bit of back office work that was required first and then once we had all the kit then we introduced it and it became clear it wasn't really working, it wasn't being done as it had been intended and we had to sit down and talk about it again and eventually, things seem to be working now. (Participant 12, Clinical Lead)*

Some participants felt the changes had been surprisingly easy to make. Finding ways of engaging, and working effectively, with those outside the core MDT was often crucial. Achieving this successfully could be the key to being able to implement a meaningful and sustainable change.

> *SO THE SPEEDING UP OF THE PATHOLOGY RESULTS, I MEAN, WAS THAT AN EASY THING OR DIFFICULT THING TO PUT INTO PRACTICE?*

> *It was probably a lot easier than we realised and it just took a little bit of initiative and communicating with certain people and I have to say that the pathology department were very accommodating and have excelled themselves in helping us with it. (Participant 09, CNS)*

However, in cases where change had not been achieved, participants tended to talk about their attempts to implement the changes outlined in their QIPs as having been thwarted by factors

outside of their control, such as staffing shortages, budget constraints, or some missing part of the required infrastructure.

> *The Trust ran out of money so didn't employ a radiologist, but we have just got one in post recently so we've had to work within the constraints of that but things are being developed, but obviously not in the way we thought because without the radiologist you can't develop a service, but that is happening now that they've just employed someone last week. (Participant 10, Clinical Lead)*

> *We were also looking at increasing the number of clinical trials we're recruiting to, I mean, that's modestly improved, I think that's still an issue, still a problem, there's a lack of suitable studies actually at the moment. (Participant 12, Clinical Lead)*

Technical problems with IT seemed to be the most intransigent - the example below about the QIP being held up for want of a memory stick shows how an apparently small resource issue could have a big impact.

> *We have a laptop, we have the programme set up to electronically scribe all the outcomes from the MDT, but we haven't used it yet, we're still writing all the results down and getting them typed and everything, and the reason for that is that we need an encrypted memory stick which we asked for months ago, and you know, must cost a few, few pounds [but] still hasn't turned up…these frustrating little niggly aspects that stop you from making quick progress. (Participant 14, Other Clinician)*

This was not always the case though – sometimes the required pieces of equipment or additional resources appeared to have been secured with minimal fuss.

> *Obviously we didn't have the equipment like laptops for the MDT, I think we actually had to get that sort of IT equipment, we already had all the videoconferencing equipment in the MDT, so I don't think there was anything, anything really, and I think everyone sort of was keen to, to make the changes, so I think it's went pretty well.*
>
> *WAS IT DIFFICULT TO GET HOLD OF THE LAPTOP, OR WAS THAT, DID THAT GO OK?*
>
> *Yeah, that all went fine. (Participant 08, Manager)*

Making sure you had the people who could make things happen involved and engaged from the outset could make things an awful lot easier, particularly when they would be needed to authorise spending or make decisions about staffing.

> *BUT DEFINITELY GETTING THE SENIOR MANAGERS INVOLVED ACTUALLY WAS CRUCIAL FOR YOU?*
>
> *I think, well I always think that's the fundamental thing, otherwise you're fighting a losing battle to start with, aren't you? (Participant 34, Manager)*

A key element to making progress was a motivated and enthusiastic team of individuals. These types of teams appeared to be those who had gone into ILCOP with pre-existing ideas about some of the

changes they wanted to make – they were seizing on ILCOP as a way of making a change that they genuinely believed was needed happen.

> *I mean, the things that have helped have probably been quite an enthusiastic team who wanted to change things and people who had seen things that they wanted to change but [before ILCOP] not really felt confident enough to do it. (Participant 02, Other Clinician)*

In a small number of cases, a lack of progress appeared to be regarded by some MDT members as due to a lack of commitment and effort by others in their team. There was a suggestion that if people could not discern any personal gain to them from making a change, they would be less willing to stick with it for an extended period of time.

> *I think his answer to the emails he was getting was very much "I'm just really busy at the moment", which is fair enough but why want to be part of the project if you're not going to put the effort in to do the project, which I found quite frustrating because I feel that if I put my mind to do something, I'm 100% committed then, do everything I can to make sure it happens, whereas other colleagues may not have that same opinion. (Participant 05, CNS)*

> *I think, you know, often from my experience perhaps, things that rely on purely, well not purely, but a lot of human behaviour, can drift, you know…if you look at personal gain it's not immediately apparent and that's one of the challenges I've got, you know…personal gain isn't obvious. (Participant 19, Clinical Lead)*

Whether the changes made are sustainable

On the whole, participants seemed optimistic that changes would be sustained. Some changes were described as already embedded and had already begun to have an effect.

> *I think they are sustainable and, indeed, we kind of, we set them out in such a way that they became sustainable, they became part, they became linked in with other things so that they had to be sustainable, yeah, we kind of built that into the process.(Participant 18, Clinical Lead)*

> *YOU CAN'T SEE YOURSELF GOING BACK TO THE WAY THAT YOU WERE DOING IT BEFORE?*

> *No, simply because you had a lot, a lot more work after the MDT, which you don't have now you see, so I find it a lot better. (Participant 08, Manager)*

There was also mention of maintaining an appetite for further review and improvement in the future.

> *YOU'RE GOING TO CONTINUE TO MAKE CHANGES, IS THE APPETITE STILL THERE?*

> *Yeah, I think so, I think it always has been a forward thinking MDT, we do have an annual business meeting where we obviously all get together and, sort of, thrash out things and try and make improvements, but we're aiming to try and do that twice a year rather than just once a year. (Participant 16, CNS)*

Others recognised that sustaining change may be more problematic, for example, if it was dependent on external factors such as maintaining the involvement of key people or staffing levels, or relied on embedding changes in human behaviour.

> *SO THAT'S BEEN A BIG CHANGE. AND THE OTHER ONE WAS INCREASING PATIENT ACCESS TO A LUNG CANCER NURSE SPECIALIST.*
>
> *Yeah, that's hopefully sustainable but it's staffing so you're never sure. (Participant 01, Clinical Lead)*
>
> *I think, you know, often from my experience perhaps, things that rely on purely, well not purely but a lot of human behaviour, can drift - you know, we haven't changed the pathway, we haven't changed the process, we haven't changed this, you know, we're just asking people to behave in a different fashion. (Participant 19, Clinical Lead)*

Whether the changes would have happened without ILCOP

Participants generally agreed that many of the changes they had implemented would not have happened without ILCOP. Even in cases where issues were already on the agenda, participants tended to think that they would not have happened as quickly or as effectively without ILCOP.

> *I think some of it would have happened because it would have had to but I don't know how I would have figured it all out on my own. (Participant 04, Clinical Lead)*
>
> *They were on the agenda prior to ILCOP, I think a lot of what, sort of, ILCOP did is it helped give the momentum to things and it helped because it was part of the project...So it's speeded up things that would have probably taken several years to happen otherwise. (Participant 02, Other Clinician)*
>
> *However, what I will say as well is, you know, it has been highlighted from the ILCOP that the radiologists need to be given time to prepare for the MDTs so that, you know, the MDTs run a lot smoother and that is happening, that's good. (Participant 11, MDT Coordinator)*

Participants often talked about needing something like ILCOP to act as a welcome form of positive and creative 'disruption' from outside.

> *I think people get quite comfy with things and I think trying to change anything takes quite a lot of energy and I don't think they'd have all happened at once, I'm not sure they'd have happened full stop, to be honest, I think the ILCOP thing has really made the difference there. (Participant 12, Clinical Lead)*
>
> *From my limited experience [working as a consultant], from what I've seen, it takes absolutely ages to implement even the most simple things and I think you need, what you need is, I think you need a bit of a kick, you know. (Participant 14, Other Clinician)*

To some extent, the nature of the different QIPs impacted on whether participants believed they would have made changes without ILCOP. QIPs concerned with data capture seemed to be where there was some disagreement about the impact ILCOP had had in driving this change.

I think that the change probably would have happened anyway because of our terrible showing on the specialist nurse measures in [the NLCA]. (Participant 06, Clinical Lead)

SO DO YOU THINK THAT THAT WOULD HAVE BEEN DONE ANYWAY REGARDLESS OF WHETHER ILCOP WAS…?

Yes, because it's come from, down through cancer networks, down through individual national league table type things. (Participant 13, Other Clinician)

Whether progress with change was fed back to the ILCOP team

There seemed a good deal of uncertainty amongst participants about whether their progress with QIP implementation had been fed back to the ILCOP team, who was taking the lead on that, and what feedback was needed. Participants often appeared a little unsure how to tackle this question when it was asked in interview.

HAVE YOU FED ANY DATA BACK TO THE ILCOP TEAM AT ALL?

I've left the feeding of data back to the lead. I think it's important that the lead who was the kind of key contact if you like for the ILCOP team, you know, our lung cancer lead is [name] so he was dealing with it. (Participant 13, Other Clinician)

There seemed to be some evidence that participants 'saved up' feedback on their progress with QIP implementation for face-to-face meetings with the ILCOP team.

HAVE YOU HAD A CHANCE TO FEED ALL THIS BACK TO THE ILCOP TEAM AND TO TELL THEM HOW IT'S BEEN?

I spoke to [ILCOP team member] about 2 or 3 weeks ago. I promised to catch up with her properly in March when I'm in the [place] meeting and I went through the various QIPs with her and went through what we'd done and not done. I probably, I haven't been as, sort of, frank or blunt maybe as I've been with you today, partly because I had 15 or 20 minutes to speak to [them] and we've spoken for much longer [in interview]. (Participant 06, Clinical Lead)

Participants sometimes talked about the timescale for making changes, recording data on the effect of the change, and reporting this back to the ILCOP team in ways that did not fit well with the ILCOP timeline. For example, when interviewed in March 2012, as the ILCOP project was concluding its work, the participant below talked about just beginning to make a start on one of their QIPs and having data on progress with all QIPs available only later in the year. They nevertheless appeared to regard this as having made very good progress.

We have already started two of the quality improvements, those are already up and running and we're just about to start the third one so, actually, it's been very, very good and hopefully we will, you know, see the proper outcomes later on this year. (Participant 11, MDT Coordinator)

How things are different now

Many participants felt that taking part in ILCOP had helped to build 'team spirit' within their MDT and help them unify around common goals, for example, meetings were often talked about as now being more productive and efficient. Taking part in ILCOP as a team had been important for many and had helped individuals better understand their role within the team and how things were supposed to work.

> *The quality of the conversations we're having are better in the MDT, it makes things a bit more efficient in terms of just general interaction between different specialities and, sort of, making sure things are a bit smoother, flow a bit more smoothly. (Participant 12, Clinical Lead)*

> *I think our pathways are a lot clearer and I think communication with people that aren't within the core members of the MDT is better. And I think that's what you've got because the responsibilities weren't only just about the consultants, I think the MDT co-ordinators are clearer now, fast track office, respiratory physicians, all of them. (Participant 34, Manager)*

There was some evidence that taking part in ILCOP had made teams more focused on continual improvement in the longer term, and had given them some useful skills that they would be able to draw on in the future.

> *So when you go to these workshops you hear about what other teams have been doing which obviously isn't your project and you think "well actually we could do that", so we've looked at our pathway as to where delays are happening and, sort of, mapped out how long it's taking for us to get x-rays and then CTs and various other things. (Participant 03, Clinical Lead)*

> *I guess the style of, of identifying problems and how to overcome them will be utilised again, you know, in next year's work programme as well. (Participant 28, CNS)*

It seems that, compared to core members such as clinicians, nurses and coordinators, the impact on the wider team surrounding the MDT (such as managers, pathologists etc) was not always so obvious, other than making their jobs a little easier perhaps. To a large extent this depended on what QIPs each MDT was pursuing and the potential within these for making a wider impact.

Participants found it easy to identify a number of positive impacts that they perceived the changes they had made were having on patient care, including : fast-tracking patients to the right treatment; collecting data to enable further improvements; reducing travelling times; offering a wider range of treatments; and considering clinical trials.

> *It's a lot quicker, the pathway, with us doing, certainly doing the CT biopsies here and the pleural aspirations here, etc., without a shadow of a doubt we've improved the patients' pathway, because they're not travelling around… it's quite difficult for them to get to that tertiary centre, so they would prefer to stay here at [hospital name] and we've facilitated that. (Participant 11, MDT Coordinator)*

I think we do try a little bit harder to, you know, push the boundaries and get diagnosis when we can and maybe not just give them palliative chemo but look, right at the beginning, "should we get a PET scan? Should we be doing concurrent chemo/radiotherapy?" Just really trying to do slightly more cutting edge things for our patients. (Participant 04, Clinical Lead)

Even where the QIPs being taken forward were not directly related to patient experience, participants could still appreciate that they may, however indirectly, ultimately be improving the care that patients received.

I think that's [impact on patient care] really difficult to quantify, because a lot of the projects we've done aren't direct …but I suppose everything else that we're doing indirectly has an effect on patient care, because if your data is accurate your patients get the right treatment and so it's, it's a bit of a nebulous, unquantifiable thing. (Participant 20, CNS)

There were a number of examples where people felt they had benefitted personally from the project, in terms of learning new skills, growing in confidence, and seeing that change could happen.

I think I haven't been involved in anything like this before and I think it just makes you realise that it doesn't always take a lot to make a change (Participant 16, CNS)

You know, the sort of, plans for change and, you know, to work out what are you trying to change and how are you going to measure it and things, I think, you know, I think that's been quite useful and I think when we look at things in the future, you know, we will try and adopt those sorts of methods, making sure that we're very clear what we're trying to show to start with. (Participant 03, Clinical Lead)

It's improved my confidence…Certainly when talking to people within my own Trust… I feel much more confident about understanding, you know, I already knew kind of how to manage lung cancer but understanding, understanding the patient pathways and the journeys and that sort of stuff, it's given me a lot of confidence. (Participant 04, Clinical Lead)

There was some evidence that participants believed ILCOP had been successful in establishing a 'clinical community'. Participants talked about now feeling able to contact their counterparts working in other areas and to seek advice and guidance from them. While this was something they could have done before ILCOP, shared participation in the project seemed to act as a kind of 'licence' or 'warrant' for many participants. Being able to use ILCOP as their way in appeared to be valued as cover to make contact with others in a way that was acceptable and appropriate, and that generated some expectation that the party approached would agree to help.

I have contacted this guy in [place] who is the guru and said "you do this really well and can I come up and spend a day with you?" and I think again I've just figured out through ILCOP that there's nothing like going to a place and seeing it in action to really understand how something can be done well. And before I just wouldn't have been able to call somebody up out of the blue and say "can I come and visit you for a day?" (Participant 04, Clinical Lead)

It gives you networking opportunities for problem solving with people who understand and are in your business and it also gives you the advantage of someone from outside your actual

kind of silo looking at you and that's standard business practice in achieving effective outcomes in any branch of business.(Participant 13, Clinical Lead)

However, the longer-term sustainability of this emergent clinical community was not clear to some participants as they recognised the crucial role the ILCOP core team had played in facilitating and coordinating it. Whether it would be able to sustain itself when that infrastructure was no longer there was less clear to some participants.

I suspect it will fizzle out, unless there's something external which sustains it, I don't think you'll get the same level of, kind of, interaction and collaboration unless there's some person or system that sustains it. (Participant 18, Clinical Lead)

So I think some of the links that have been made will stay there, but I don't think the meetings and the things that have been done are likely to, would continue, at least within the setting we work in unless there was someone who could continue to organise them and push them with the time to do it. (Participant 02, Other Clinician)

4. Discussion

This piece of work sought to find out more about participants' views and experiences of taking part in the ILCOP programme of activities, in order to inform efforts to ensure the spread and sustainability of ILCOP's work, and to inform future cancer-related quality improvement projects.

Participants' experiences of taking part in ILCOP were overwhelmingly positive – most aspects of the project were talked about positively and participants had enjoyed their involvement. The ILCOP core team was highly valued for its professional approach and for the invaluable work it did to organise and facilitate the project. Most participants felt they had been able to make at least some progress with implementing their QIPs, although some had found overcoming external obstacles difficult and not all were sure the changes would be sustainable in the longer term. ILCOP was regarded as an important factor driving the changes.

These findings are based on interviews with a voluntary, self-selecting sample of ILCOP participants. We were successful in recruiting a diverse range of participants (including Clinical Leads, Cancer Nurse Specialists, MDT Co-ordinators, other clinicians, and managers), and having representation from 70% of the MDTs we approached. However, it is difficult to ascertain to what extent the views expressed in our sample would reflect the views of the remaining seven MDTs from which we did not recruit any members. For example, the majority of participants recruited came from MDTs which have remained engaged with ILCOP throughout, and those who have 'disengaged' from the project over time may have viewed it differently. In addition, rather than the in-depth ethnographic approach used for the wider CTGTCC evaluation, this piece of work consisted solely of interviews. While interviews have enabled access to participants' views on their experience of taking part in ILCOP in a way that observation would not, this approach has meant we have only been able to access participants' self-reporting of progress with QIP implementation. It is possible participants may have felt they needed to be very positive about what they have achieved and present themselves in a 'good light'. However, there is evidence from the data collected that many participants have in fact been very frank about some of the difficulties they have had, albeit mainly those that were externally imposed.

Understanding what motivates participants to get involved in improvement activities such as ILCOP is important, both in terms of securing engagement in the first place and drawing on this to sustain participation in the longer term. In the case of ILCOP a range of motivations was discernible across the participants interviewed, including factors related to the teams that 'pushed' them to take part (such as already being able to identify changes they wanted to make) as well as those factors related to ILCOP that 'pulled' people towards it (such as association with the RCP). A key lesson for future QI activities is therefore that it is important to have a range of different hooks to attract people in and keep them engaged throughout the course of a project. It is also important to understand these motivations in order to be able to harness them effectively and not risk negating them. For example, in this case, teams were encouraged to develop their own QIPs and this worked well alongside some teams' motivation for involvement being to help them drive through changes they had already identified as necessary. While working with teams to help them develop their own QIPs was not always an easy process, seeking to impose standardised QIPs on them from outside would likely have been counterproductive for many teams.

An important strength of the ILCOP approach was having a range of different kinds of activities but all unified into one coherent programme that evolved and developed as time went on. For example, initial workshops tended to concentrate on trying to develop an understanding of the project amongst participants, peer review sessions were about identifying areas for improvement, QIP development was about making a plan for improvement, while later workshops were more about networking and sharing ideas - suggesting a maturing and deepening of network ties through the course of the programme. While participants generally talked positively about most aspects of the ILCOP programme of activities (with the online conferences being perhaps the exception), it was apparent that different people preferred different kinds of activities. For many participants, making contact with those working in other MDTS (particularly their direct counterparts in terms of occupational or professional group) was a central part of the process, but some preferred the 'depth' of getting to know one MDT well through the peer review process while others preferred the 'breadth' of meeting a wider range of MDTs at the national meetings and workshops. In terms of learning for the future, it may be useful to think about whether all participants are required to take part in all activities, or whether some activities are regarded as core while others (for example, online conferences in between face-to-face events) are more optional.

ILCOP secured a diverse range of participants in both reciprocal peer review and workshops. At a minimum, all teams comprised a clinical lead, clinical nurse specialist and an MDT co-ordinator, but in many peer review visits other MDT members also participated – for example, oncologists, radiologists and cancer service managers. The participation of a broader range of stakeholders (such as managers) was often key to securing subsequent improvements, while the carefully planned structure of peer review visits and workshops and high quality facilitation worked well to ensure that (for the most part) these, more peripheral, participants did not feel excluded or marginalised. However, the best model for engaging these more peripheral stakeholders is perhaps not yet clear. We know that involvement of groups such as managers (at all levels of seniority) and IT staff can be crucial in facilitating the implementation of change (Martin *et al*, 2009) but how is this best achieved in practice? Some participants appeared to be suggesting that these kinds of staff from their own Trusts could have been more engaged in the ILCOP activities throughout (i.e. beyond the peer review visits), but aiming for this kind of commitment from staff who work across a Trust more widely and are not lung cancer MDT focused may be inappropriate and unfeasible.

A better model, and one which draws a boundary between the responsibilities of the core team and those of the local team, may be to include support or training for participants from each MDT to help them develop the skills to engage and persuade stakeholders at their local level. Across our CTGTCC evaluation more broadly, we found that local participating site leads played a crucial role; they needed to secure the buy-in of both their own team and other relevant stakeholders within their organisation (and possibly more widely) as well as oversee processes around planning and implementation at local site level. It was a demanding role which required not only technical skills but also social and political skills, credibility, and the ability to influence others. Identifying the right person for this role could be key – those with the necessary skills (technical, interpersonal and other), motivation and influence to act as local champions within their own sites.

The aspect of peer to peer engagement throughout ILCOP has been crucial for participants; important both in terms of occupational or professional grouping but also those working in this specific disease area rather than elsewhere. ILCOP was able to exploit both of these elements of peerness. ILCOP participation seemed to act as a kind of 'licence' or 'warrant' for many participants, in that they could use it as cover to make contact with others in a bid to share experiences and learn from each other. While this was perfectly possible before ILCOP, being part of the same clinical community (Aveling *et al*, in press) appeared important in making participants feel comfortable about doing this. Learning is more likely to occur where there is trust, a willingness to take risks, and an acceptance that mistakes can be made – so the creation of "safe spaces" allowed by networks is important (Downe *et al*, 2010).

It is interesting to reflect on how participants' accounts of their performance within ILCOP fitted with the core team's (and our wider CTGTCC) observations of how much progress has been made. For example, most participants interviewed appeared to suggest that the process of developing a range of QIPs was a fairly smooth process, with the areas on which to focus either being on the team's radar prior to ILCOP or emerging from the peer review visits. The ILCOP process involved teams submitting their proposed QIPs to the core team for review and, in some cases, considerable work was needed to work these up to what was regarded as an acceptable and appropriate QI standard. For example, in terms of the specificity of aim, a clear time frame, and sensible indicators to measure progress. It may be that there was a significant mismatch here between what people thought was the standard they needed to be working towards, and the level for which the ILCOP team was aiming. For example, about two thirds of participants interviewed reported having no previous QI experience, and those that did talked about a variety of activities ranging from local initiatives to formal QI training. To what degree participants really developed an understanding of, and embraced, QI methods, particularly in relation to gathering and feeding back data is not clear. It may be that where teams believed they were getting helpful feedback from the core team to make an already satisfactory QIP even better, the core team felt it was having to work very hard to get the QIPs up to standard. A similar tension may also help to explain the different ways in which the impact of the changes made was assessed, and the importance attached to having robust data available to support this.

Where teams were not so successful in implementing their planned QIPs, it is not clear what more participants thought the ILCOP team could have done to help. Where teams reported having struggled to make progress with implementing planned changes, this tended to be because of constraints or obstacles within their local setting, such as staff shortages or problems with securing new IT equipment. Short of the ILCOP core team going into individual Trusts and fighting on behalf of the lung cancer MDT (which, on the whole, was not seen as desirable or likely to be effective) participants did not have suggestions for what more the team could have done. As discussed above, giving (particularly inexperienced) local team leads support in developing and exercising the social and political skills required to influence others may have been useful, as there was some suggestion that this more tacit knowledge (the *how* as well as the *what*) was an important part of the information participants were keen to glean from their counterparts working in other Trusts.

In conclusion, our findings suggest that ILCOP was successful at mobilising a clinical community around improving lung cancer outcomes, and that the project was an attractive prospect and

positive experience for those participants we interviewed. However, particular challenges around implementation of changes at the local level, and measuring the impact of these, may need further consideration. There are several important lessons for future quality improvement projects in this area.

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Appendix 1: Teams represented in evaluation

Aintree University Hospitals NHS Foundation Trust

Airedale NHS Trust

Basildon and Thurrock University Hospitals NHS Foundation Trust

Basingstoke and North Hampshire NHS Foundation Trust

Burton Hospitals NHS Trust

Heart of England NHS Foundation Trust

Leeds Teaching Hospitals NHS Trust

North Cumbria University Hospitals

Northumbria Health Care NHS Foundation Trust

Peterborough and Stamford Hospitals NHS Foundation Trust

Portsmouth Hospitals NHS Trust

Royal Cornwall Hospitals NHS Trust

Royal United Hospital Bath NHS Trust

Salford Royal NHS Foundation Trust

Sherwood Forest Hospitals NHS Foundation Trust

The Queen Elizabeth Hospital King's Lynn NHS Trust

The Royal Wolverhampton Hospitals NHS Trust