4E's Socratic Model: A grounded theory for managing team creativity in an organisational context

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Chapter 4: Results & Theory Development

This study uses a Grounded Theory methodology to explore the use of a Socratic approach to managing team creativity in an organisational context and to create a theoretical model that will enable the process to be replicated in the real world. Section 4.1 describes the method of data collection. Section 4.2 describes the benchmarking process and Section 4.3 discusses the first stage of theory development following the benchmarking process. The remaining sections summarise the findings of individual workshops and the ongoing development of the theory based on them.

This chapter continues the examination stage of the Socratic model by identifying what views have been exposed.

4.1 Organisation 1

The company chosen was in a service industry and consisted of the senior management team, which included an owner-manager and two key staff. The question to be addressed (What are the distinct competencies we have over our competitors?) was determined in a previous meeting with the initiator of the project (one of the key staff members). The workshop was divided into four steps in line with the steps in a Socratic dialogue as outlined in Chapter 3. A summary of the discussion is detailed below.

4.1.1 Discussion

To commence the Socratic Dialogue, the question posed was: “What are the distinct competencies we have over our competitors?” In exploring what participants
currently believed, six points were raised and agreed on by participants. These were: people driven; not “cookie cutter”; insightful; not “platform” reliant; create actionable insights; deliver (offer actions) on insights: “deliver the intelligence”.

Taking each point in turn, participants were asked to provide any supporting evidence for their beliefs. It seemed that the above points were things that the company routinely said to clients but that no-one could easily articulate. Interestingly, the only ‘evidence’ that participants could come up with was a broad “feedback from clients” statement, which created a sense of aporia in the group as the reason this question was raised originally was because the company wanted to improve their responses to tender requests after they had received feedback that their standard response lacked strong supporting evidence of claims made.

This led into the third stage of the Dialogue (Argument) where each of the 6 points were examined by posing the question “Could your competitors claim the same thing?” Initially, participants tried to defend the validity of each point until one said, “Generally the competencies we talk about are not recognised in feedback from tender submissions we make.” This comment, while negative, seemed to bring people closer together and subsequently four claims were abandoned and the two remaining ones (create actionable insights and deliver the intelligence) were questioned further by asking participants to describe how these attributes were manifested in projects they had worked on. Examples of these competencies in action were: principals take an active part in jobs; work with clients in implementation phase; appeal to multiple audiences through customising reports and other communications to audience; credibility allows access to Board level; flat structure enables work to proceed under duress (deadlines, access).
In the final stage of the Dialogue (Results) participants were more focused and worked as a team rather than promoting individual agendas. This was particularly apparent with the Principal of the organisation, as initially he appeared to listen to other viewpoints but not take them in. The descriptions provided by participants were assembled to form part of a proposed project management methodology they could field test and then use as evidence of their unique capabilities. The methodology outlined in Figure 4.1 was the final outcome of the dialogue:

Figure 4.1.
Proposed project management methodology

<table>
<thead>
<tr>
<th>Methodological steps</th>
</tr>
</thead>
<tbody>
<tr>
<td>Senior management meet at design stage to ensure proposal is both appropriate and outcomes-focused.</td>
</tr>
<tr>
<td>Team chosen based on job type and complexity (internal and external)</td>
</tr>
<tr>
<td>Proposed programme and timeline presented to client.</td>
</tr>
<tr>
<td>Client input to approve or amend.</td>
</tr>
<tr>
<td>Instrument design phase.</td>
</tr>
<tr>
<td>Client signoff for programme.</td>
</tr>
<tr>
<td>Establishment phase (subject recruitment, instrument setup)</td>
</tr>
<tr>
<td>Pilot phase (for “sensitive” projects)</td>
</tr>
<tr>
<td>Conduct programme</td>
</tr>
<tr>
<td>Client progress reporting (agreed intervals and forms)</td>
</tr>
</tbody>
</table>
Reporting phase (multiple levels including physical, written and workshops as required).

The session lasted approximately three hours and all the participants expressed surprise that a problem they had found difficult to resolve could be solved so quickly. They also felt encouraged to refine the methodology they developed in the session further.

In subsequent interviews, all of the participants agreed that the process was both painless and gave them a sense of ownership that they didn’t have before. This feeling can be summed up best in the comment of one participant who said: “Yes, I definitely think the process we went through got us to a good answer to our question. And, I suspect it could encourage empowerment, inclusion and as a result creativity in an organisational situation. It gave me confidence to think more creatively in future.”

The workshop with this first group was designed to provide a benchmark for running a Socratic dialogue in a team environment by testing the initial model that came out of the literature review. The objective was to determine whether the model could be successfully applied in a real-world context and the result indicated that the process was robust. The outcome was that the process was an easy one to work with and no one was confused by the task or had questions that weren’t covered in the introduction to the Model. The process produced an outcome that participants were happy with and provided a platform for future creative endeavours. This was confirmed by feedback from participants afterwards, which supported the hypothesis that creativity would be enhanced through using this process.
Based on this I concluded in a memo afterwards that the 4-step process was an effective way to manage a meeting in a team environment as it produced an outcome in a short time that all group members were happy with, and it provided two bases for further development (competencies and a methodology).

However, to provide a baseline from which to compare, some form of measurement was required. The intention was for it to be provided via the use of in-depth interviews but in the real-world environment it was not possible to administer these concurrently, and access to all of the group members (particularly senior management) was extremely limited. Therefore, a written questionnaire was developed from the interview guide used with the first group, which was then incorporated into the running of subsequent workshops to provide an assessment from all participants in situ.

In a separate post-workshop interview with the instigator of the project the following feedback was obtained (see Figure 4.2).

Figure 4.2.

*Workshop 1: Interview record*

<table>
<thead>
<tr>
<th>Interview Record</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Section 1: Tasks requiring creativity</strong></td>
</tr>
<tr>
<td><strong>Topic</strong></td>
</tr>
<tr>
<td>Incidence of creativity in the respondent's department</td>
</tr>
<tr>
<td></td>
</tr>
<tr>
<td><strong>Section 2: Leader-member exchange</strong></td>
</tr>
<tr>
<td><strong>Topic</strong></td>
</tr>
<tr>
<td>Working relationship between leader and member</td>
</tr>
</tbody>
</table>
I can rely on my boss to support me.

Section 3: Support for creativity

<table>
<thead>
<tr>
<th>Topic</th>
<th>Response</th>
</tr>
</thead>
<tbody>
<tr>
<td>Existence of conditions under which creativity might flourish</td>
<td>Taking time out to discuss many issues.</td>
</tr>
<tr>
<td></td>
<td>Perhaps bring in outsiders to help facilitate.</td>
</tr>
<tr>
<td></td>
<td>Failure to meet internal type deadlines is ok (often not chased up by manager) but client-related failure is not accepted.</td>
</tr>
</tbody>
</table>

Section 4: Creative self-efficacy

<table>
<thead>
<tr>
<th>Topic</th>
<th>Response</th>
</tr>
</thead>
<tbody>
<tr>
<td>Level of confidence in ability to be creative</td>
<td>Generally work within standard boundaries and don’t feel particularly creative.</td>
</tr>
<tr>
<td></td>
<td>Feel too busy to have the luxury of “creative time”.</td>
</tr>
</tbody>
</table>

Section 5: Followup interview

<table>
<thead>
<tr>
<th>Topic</th>
<th>Response</th>
</tr>
</thead>
<tbody>
<tr>
<td>Change in creative efficacy</td>
<td>Yes, I definitely think the process we went through got us to a good answer to our question. And, I suspect it could encourage empowerment, inclusion and as a result creativity in an organisational situation.</td>
</tr>
<tr>
<td></td>
<td>It gave me confidence to think more creatively in future.</td>
</tr>
</tbody>
</table>

4.2 Theory Development – Stage 1

After each stage of the data gathering process, in line with Spiggle’s (1994) recommendation, I made ongoing revisions based on previous analysis so that the emerging theory was tested in future data gathering. Based on the data gathered from the first organisation, the finding was that the process itself was effective but that to achieve legitimacy in a real-life context there should be some form of initial measurement made to be able to quantify the value of the process over time.

To allow for this in future workshops the process began with the administration of a confidential written questionnaire to each participant to provide a benchmark of each team’s self-reported creativity. Following the workshops, participants were
asked to record observations about the process and any changes in their own personal sense of creativity.

4.2.1 Questionnaire

The purpose of the questionnaire was to provide a creativity index for a group that can be used as a benchmark against which changes in creativity can be measured in future. To provide a useful index of team creativity, such a questionnaire should include questions relating to the main constituents of a team: the individual, the organisation itself, and the management.

**Individual motivation**

Intrinsic motivation has been identified by researchers as having a strong link to individual creativity (Amabile & Gryskiewicz, 1987) and is also linked to organisational effectiveness (Kim et al., 2009). To measure individual proactivity two questions are proposed:

- To what extent do you actively seek out opportunities to try new things?
- How comfortable are you in taking risks when it comes to trying out new ideas?

**Organisational climate and managerial support**

Amabile et al. (1987) identified five contextual conditions that impact on creativity: freedom, encouragement, resources and time, recognition, and challenge. This is broadly supported by Andriopoulous (2001) who also adds leadership style.

These factors have been extensively measured through Amabile’s KEYS framework (Centre for Creative Leadership, 2010), which is an organisational survey that measures the climate for creativity in an organisation.
Based on the areas identified in the KEYS framework, Figure 4.3 lists the relevant areas and the questions I proposed to provide a measure of them (including the two individual creativity questions at the end).

Figure 4.3.
*Areas of exploration*

<table>
<thead>
<tr>
<th>Area</th>
<th>Question</th>
</tr>
</thead>
<tbody>
<tr>
<td>Degree of Freedom</td>
<td>Is there much freedom for you to decide how to perform work?</td>
</tr>
<tr>
<td>Encouraging environment</td>
<td>Are you generally encouraged to find new or alternative ways of doing things?</td>
</tr>
<tr>
<td>Lack of impediments</td>
<td>Is it possible for you to learn new things through your work?</td>
</tr>
<tr>
<td>Need for recognition</td>
<td>How well do you feel that your immediate supervisor understands your problems and needs?</td>
</tr>
<tr>
<td>Managerial support</td>
<td>Regardless of how much formal authority your supervisor has how likely are they to “bail you out” when you really need it?</td>
</tr>
<tr>
<td>Organisation climate</td>
<td>What level of tolerance is there for failure in your organisation?</td>
</tr>
<tr>
<td>Sufficient resources</td>
<td>Do you have access to resources you might need when developing new ideas?</td>
</tr>
<tr>
<td>Managerial encouragement</td>
<td>Is management actively enthusiastic and supportive for new ideas and new ways of doing things?</td>
</tr>
</tbody>
</table>
Proactivity To what extent do you actively seek out opportunities to try new things?

Level of comfort How comfortable are you in taking risks when it comes to trying out new ideas?

A copy of the instrument is included as Appendix 5.

The proposed questionnaire was designed in two parts. Part A consisted of 10 questions, each using a 5 point Likert scale with 5 being the highest score (Figure 4.3). The 10 questions were adapted from Amabile’s comprehensive KEYS tool, which measures the innovation climate in work teams. My questionnaire had three categories of question measuring:

- a person’s own feeling of individual creativity
- the level of organisational support for creativity
- the level of supervisory support for creativity.

From these questions, it can be established whether there is a mitigating effect of the Socratic Dialogue on individual or team creativity over time.

Part B, administered immediately after the workshop, consists of a single qualitative question: “If the process used today to facilitate the discussion became a routine part of team operations in your organisation, would it change any of your views expressed in your answers to the questions in Part A? If so, which ones and in what way?”
4.2.2 Proposed workshop structure

Each workshop consisted of a Socratic dialogue structured to address a question of concern to the organisation.

Based on answers to the 10 questions in the questionnaire, a creativity index was compiled for each person and then a total creativity index for the group was calculated based on the arithmetic mean (average) of the individual scores. Each person’s score reflects their ranking for each question (n) on a scale of 1-5, therefore the creativity index is n/50.

The value for management in having a measure such as this is that it provides a benchmark against which change in perceptions of creativity (both in organisational climate and individual feelings) can be measured. It also serves to identify the degree of alignment within the team to help identify competencies and issues the facilitator needs to be aware of and plan for. It is not designed to produce any comparable quantitative data but rather to gain insight into the qualitative responses.

From a theory development perspective, the creative profiles were compiled to demonstrate that the results weren’t dependent on having highly creative individuals in a climate conducive to creativity.

4.3 Organisation 2

This organisation operates in the education sector. The workshop was attended by eight members of a specific department including the manager, who acted only as a team member.

4.3.1 Creative profile

Based on answers to the questionnaire this group had an overall creativity index of 38.6.
Figure 4.4: *Individual creativity index CO2*

![CO2 - creativity index](image)

Figure 4.5: *Question rankings – CO2*

An analysis of the 3 categories of question produces an index of:

- Self = .76
- Supervisor = .81
- Climate = .76
This indicates that the group has members with a wide variation in individual creativity but a strong sense of support from their immediate supervisor (more so than support within the organisation itself). One group member had a significantly lower creativity index than the rest of the group.

4.3.2 Discussion

The Socratic dialogue session lasted for approximately 2 hours and finished with agreement on two follow-up actions. While all members of the group actively participated in the discussion, in the initial stages some members held back while others dominated the discussion. When analysing the questionnaire responses, it was clear that this could be caused by the high variance in overall creativity. One member in particular seemed reluctant to participate fully (C2P6). In this case there was a lack of agreement on the question itself that was provided by the organiser of the session. This caused the dialogue to stall but after backtracking and asking the group to debate the question, which was to discuss service levels in the face of budget cuts, participants became more engaged and after agreeing on the question seemed to operate much more as a team; all members took an active part in the rest of the dialogue.

Having agreed that the question should be “What is the meaning of pastoral care as a service delivery imperative?” the group was asked what they currently believed about the issue. They spent some time discussing the specifics of the question without reaching any consensus. After further questioning the following consensus was reached:

- It was agreed that firstly Pastoral Care is not just a top level “mission statement” but something that is actively implemented in day-to-day dealings with clients.
• While Pastoral Care is not formally measured or recognized (apart from client feedback) it should form part of the KPIs for staff.

• Pastoral Care should be a point of difference for the organisation and is therefore desirable even under a restrictive budgetary environment.

Participants were then asked to list ways in which this concept is applied within the organisation and agreed on the following:

• Providing extra face time (one on one) for clients

• Smaller class sizes

• Ethical marking practices

• Open access to staff

• Positive client-to-client interactions

• Sense of community through curriculum and other activities

• Recognizing the “whole person” through the interview process rather than just academic achievement.

The next stage was to examine any conflicting views. Participants reiterated their belief in providing pastoral care but highlighted two barriers:

• Lack of formal recognition of effort in this area affects delivery

• Pressure on workloads and resources means ability to provide pastoral care is negatively impacted.

Overall, there was a general feeling of frustration directed at upper management. The variance in response to questions relating to this produced quite spirited responses. This feeling is summarised by the following comment from one participant:
“It is difficult to change because it needs to be approved by too many people up the line. The organisation is rigid but our manager encourages creativity which makes it less frustrating.”

As a result, 5 of the 8 participants reported that they would not change their responses to the creativity index questions as a result of the session. One participant (above) identified organisational rigidity as a barrier to change, and two participants felt that the process would be effective as a change agent if senior management were facilitating change via this process. The team as a whole seemed quite cohesive and showed considerable support for their immediate supervisor. The main barrier to creativity was a perceived lack of organisational support, reinforcing Park et al.’s (2014) view that this is a precursor to creativity in work groups within the organisation.

The session ended with agreement on two actions:

- Work on senior management interface to gain support.
- Reduce churn through enrolment process. For example: automatic confirmations, teaching early.

### 4.4 Theory Development – Stage 2

The use of a Socratic dialogue as a process was effective as a management technique in running a “creative” meeting but without senior management input and buy-in it was felt that it would not result in a more creative environment overall. However, this could be (in part at least) offset by the development of group ownership of the process. This team initially did not buy into the process, as they could not see a return on their investment in time. It was only when, as facilitator, I stepped back from the process and got the group to debate the question itself that a
sense of ownership developed; therefore the stages of the dialogue itself don’t provide sufficient structure to produce a successful outcome. To counteract this a second dimension adding processes to provide guidance for the facilitation of a Socratic Dialogue will be added. This will avoid producing a “black box” model, described by Hildbrandt and Oliver (2000) as one where “…the phenomena in question are not directly observable” (p 195). Such a structure should include type and staging of questions as well as procedures for group maintenance (Gose, 2009).

In the Socratic Dialogue currently there is a “black box” between each stage in which both inputs and outputs are known but not the process to get there. Based on the experience gained from this group the first step in the process should be to generate group ownership by debating the question itself and arriving at a consensus, as suggested by Bolten (2001) and Chesters (2012). This will also help to create a cooperative climate that is the first step in developing a creative team (Schilpzand et al., 2011).

4.5 Organisation 3

This organisation operates in the health sector. The workshop was attended by three members of a specific department including the manager, who acted only as a team member.

4.5.1 Creative profile

Based on answers to the questionnaire this group had an overall creativity index of 41 (with individual indexes ranging from 37 to 44). This was higher than the proceeding group and there was also less variance between group members.
Figure 4.6: Individual creativity index CO3

An analysis of the 3 categories of question produced an index of:

- Self = .87
- Supervisor = .87
- Climate = .79
4.5.2 Discussion

The question posed was “What events/programs should we provide to GPs for the remainder of the financial year?” This question was arrived at as a consequence of a vigorous discussion on identifying the most pressing issue facing the organisation. This approach, developed as a result of the first workshop, made a positive difference by engendering a strong sense of group ownership. This was illustrated by the view of one of the participants who said “Having buy-in from all participants was important - this guided the discussion to keep on track (historically a challenge for us).” As a facilitator it also allowed me to identify any tensions and possible areas of disagreement as an aid to future questioning.

The current problem for the group was that a number of activities had been proposed covering a wide range of issues; however, there was a feeling that the organisation didn’t have the capacity to manage them and they were not sure of their mandate for various types.

Participants were then asked to first step back from the question of specific activities and address the question of who their clients are. It was agreed that they provide healthcare support to GPs who are also members of the organisation. During the discussion the following conflicting views were exposed:

- That the organisation should provide advocacy type services rather than programmes.
- That the organisation consider as broad a range of opportunities as possible.

At this point there was general agreement so as facilitator I asked them to consider what actions they would like to take. Two actions were agreed on:
• That the organisation focus on providing programmes in areas that have proven successful (mental health).

• That programmes are done in partnership with organisations that can provide the funding for them. On this basis, 3 programmes were approved:
  o [NAME] Hospital – follow-up event
  o [NAME] – sensory modification
  o [NAME] (or similar) mental health skills.

The Socratic Dialogue session lasted 90 minutes and finished with agreement on two follow-up actions. In a briefing prior to the discussion a key issue was identified relating to potential conflict between the Board and operational staff in terms of expectations. All participants agreed that the Socratic Dialogue approach removed this conflict. Summing this up, one participant stated: “This approach increased the level of input non-Board staff had, which in turn would increase their buy-in and feelings of being valued.”

All participants agreed that this process “enabled an open dialogue” and produced an outcome that “was better than expected.” One participant summed up this sentiment by saying, “Yes, we were able to have a more open and constructive conversation, which helped us to nail down what we wanted to do and what was realistic/feasible.” This idea of the process ending with a realistic and feasible outcome is a key test for the Socratic process being followed as without it an idea, no matter how creative, would have limited value to the organisation.

4.6 Theory Development – Stage 3

In order to facilitate open dialogue, two ideas have emerged so far; engagement of all participants and ownership of the question.
The first can be facilitated through the use of concrete questions that explore what people know rather than their opinions. The ideal place to start is a discussion on the question itself with input from all participants so that the process starts with an agreement and thus creates ownership of the question (this was evident from the results of the second workshop).

This approach is supported by Boswell (2006) who, in discussing the use of questions to encourage critical thinking, identifies three question types: concrete, abstract and creative, which progressively move from lower level enquiry to higher level abstract and creative thinking. As an aid to implementing the Model a base-line questioning layer was added to map an appropriate question type to specific stages of the process (see Figure 4.8).

However the addition of a questioning layer, by itself, does not provide enough insight for someone to work with the model without training and/or experience. Neenan (2009) highlights the danger in relying on intuition when it comes to facilitating a Socratic Dialogue. This was an issue in conducting this study to this point, as even though I had prepared a range of questions in advance these only formed a relatively small part of the questioning process.

The key to a successful Socratic dialogue is that it should be a co-operative investigation (van Hooft, 1999) that ends with a consensus rather than an interrogation. To achieve this, the role of Socrates is not just to question; he must also recognise and react to the dynamics of the group (Gose, 2009) by reigning some...
participants in and encouraging others. So the role of questioning is two-fold; on the one hand to stimulate discussion and on the other to stimulate ownership of both problem and solution.

A number of authors (Elder & Paul, 1998; Boswell, 2006; Oyler & Romanelli, 2014) suggest categories of questions to consider. Boswell focuses on a top-level progression (Concrete, abstract, creative) that has been incorporated as the second layer of the Model and is supported by Oyler and Romanelli (2014) who propose procedural (concrete facts), preferential (abstract opinions), and judgemental (synthesis or creative) questions. Elder and Paul (1998) provide a handy checklist to ensure the right question is asked for the right purpose:

Figure 4.9.
*Question type and purpose after Elder and Paul (1998)*

<table>
<thead>
<tr>
<th>Question type</th>
<th>Purpose</th>
</tr>
</thead>
<tbody>
<tr>
<td>Purpose</td>
<td>Task definition</td>
</tr>
<tr>
<td>Information</td>
<td>Examining quality</td>
</tr>
<tr>
<td>Interpretation</td>
<td>Examining meaning</td>
</tr>
<tr>
<td>Assumption</td>
<td>Questioning beliefs</td>
</tr>
<tr>
<td>Implication</td>
<td>Examine consequences</td>
</tr>
<tr>
<td>Relevance</td>
<td>Information filtering</td>
</tr>
<tr>
<td>Precision</td>
<td>Accuracy</td>
</tr>
<tr>
<td>Logic</td>
<td>Examining the whole</td>
</tr>
</tbody>
</table>
While Elder and Paul’s questioning checklist provides a useful guide, it is important to remember that questions are not asked according to a predetermined schema as each person will apply their own contextual filtering process before answering. Therefore depending on the questioning stage (concrete, abstract, creative) a particular question should be posed to match the purpose.

4.7 **Organisation 4**

This organisation operates in the clinical health sector. The workshop was attended by three members of a specific department including the team manager, who acted only as a team member.

4.7.1 **Creative profile**

Based on answers to the questionnaire this group had an overall creativity index of 44.67 (with individual indexes ranging from 43 to 47). This was the highest index of the groups so far and while two of the three members had a similar index, one person was significantly higher.
An analysis of the 3 categories of question produces an index of:

- Self = .83
- Supervisor = .93
- Climate = .90

4.7.2 Discussion

While the group was small, at the beginning of the session there was a feeling of suspicion as only the manager (who had the highest overall creative index) had been involved in the decision to hold the workshop; however, the addition of the debate on the question (which resulted in confirmation of the original question) and the structured nature of the questioning process quickly overcame this. This was validated by one participant, who said, “I think the process is a very useful way of drilling down, minimising misunderstandings and ensuring a shared understanding. I think it is a useful way to identify new opportunities.”
In response to the question, which was “What are our core competencies?” participants were asked to nominate what they currently believed were their competencies. These were:

- Local
- Flexible, innovative
- Efficient (money and people)
- Governance and risk management
- Can-do people (we make stuff happen)
- Outcome focused
- Early intervention mission
- Passion
- Supportive of people (people development)

The manager in the group tended to dominate discussion. This was overcome by asking each participant to provide examples of actions relevant to each competency. After each example was given I asked further clarifying questions and also engaged the other members so that there was agreement on each one before proceeding. This process, while challenging to me as a facilitator, resulted in only four of the original nine competencies being carried forward. These were:

**Local:**

- Knowledge of issues
- Connected to a network
- Community trust and respect
Flexible/creative

- No preconceived ideas or agenda
- Take on client interests
- Use network
- Design based on end-user needs
- Seek solutions not blame
- Focus on continuous improvement
- Understanding and addressing barriers for participation (eg, access issues)
- “Project team” rather than “silo” approach to managing
- no “wrong door” policy

Efficiency

- recruit talent based on “fit” and motivation
- focus on deliverables (action plans instead of meeting minutes)
- encourage creative solutions by tolerating failure
- reinvest profits back into service delivery (financial efficiency)
- draw in people who have the answers (internal and external)

Governance

- robust policies (continuous review and adapt)
- constant evaluation (critical thinking)
- challenge everything
- training (up-skilling)
• individual autonomy
• balance of trust, freedom and responsibility
• life and death decisions
• sustainability

Participants were then asked to debate the best description of each competency identified above. Once all views had been canvassed, these were agreed and noted.

In the final stage, agreement was reached on two follow-up actions.

• That the organisation positioning be centred around “early intervention focus”
• That the findings above be communicated widely within the organisation.

The Socratic dialogue session lasted 120 minutes, which was long but the combination of ongoing questioning and agreement being reached at each stage meant that the group was largely unaware of the time and remained engaged throughout.

Following the session there was general agreement that this process should be implemented across the organisation. A follow-up email from the manager a week later confirmed this had been done: “We have spent this week following up on actions from our meeting and have introduced this concept across other areas of our business and are very happy and impressed by the results we were able to achieve.” This statement reinforced the simplicity and clarity of the process and also that it could be easily implemented.

While there were no new insights related to the Socratic model that arose, this session provided critical validation of the changes to the process made so far and also
validated the process as a whole. I noted at the time the process went smoothly and also that this group during the latter stages seemed to act together intuitively so that the dialogue seemed to flow. This was more pronounced than in the previous two groups and is something that begged further investigation in future sessions and in reference to the literature.

4.8 Organisation 5

This organisation operates as an NGO (non-governmental organisation). The workshop was attended by three members of a specific department including the team manager, who acted only as a team member.

4.8.1 Creative profile

Based on answers to the questionnaire this group had an overall creativity index of 37 (with individual indexes ranging from 31 to 47).

![Creativity Index](image)

Figure 4.12: Individual creativity index CO5
An analysis of the 3 categories of question produces an index of:

- Self = .80
- Supervisor = .80
- Climate = .70

4.8.2 Discussion

The Socratic dialogue session lasted for approximately 75 minutes and finished with agreement on a positioning statement containing three platforms (this was the group’s desired outcome, agreed on during the opening discussion).

The question posed was “How do we present our vision for integrated health care?” This group being all members of the same department quickly agreed that this question was vital and wasted no time on debate.

Participants were asked to identify the issues relating to patient-centred care in the new healthcare environment—these were:

- Where do GPs fit
• Limited health literacy
• One size doesn’t fit all

The new Primary Care Networks in which this organisation was to operate are designed to bring a team-based approach to primary care. The key conflict is where each member of the care team fits and what the patients’ best interests are. This was debated for a time and seemed to be going in circles, so as facilitator I asked participants to consider the issue from the GPs’ perspective and canvassed stories from the field that reflected what GPs were saying.

After each participant recounted their insights the group came to agreement on the ideal GP position. This was that it should be based on a three-pronged platform:

• Respect and understanding
• Providing a better outcome for both the patient and the State
• The lynchpin of patient-centred care.

All members of the group actively participated in the discussion and were surprised at how easily they managed to come to a conclusion using the Socratic dialogue model (given that this was a question they had tried and failed to get agreement on in the past). Part of this they attributed to having an external facilitator but they also felt that the process encouraged everyone to be involved, which limited dominance by any one participant, with one person noting on their questionnaire:

“I believe this methodology will allow outcomes to be achieved more quickly and also to be more inclusive i.e. a way to encourage the quieter, less experienced members of the team to feel confident enough to contribute.”
4.9 Theory Development – Stage 4

This group showed the greatest variance in creativity as measured by the creativity index. In a team setting, shared belief (which seemed to be lacking in this case) is an important element in protecting against setbacks and attaining a desired outcome (Bandura, 2001) and contributed to the lack of cohesion.

In analysing the variance, it was mainly caused by the low scores of one participant, who was new to the organisation and who worked mainly in the field. The other two participants were quick to agree on an answer, at times taking leaps based on their higher level of tacit knowledge. Runco and Chand (1995) make the distinction between declarative or factual knowledge and procedural knowledge or “know how” – in this case we are dealing with a deficit in procedural knowledge. To counteract this, there needs to be a mechanism to expose any relevant procedural knowledge, which is often tacit, to ensure all participants can contribute without being hampered by a lack of understanding.

As facilitator I struggled at times to ask questions that reflected the variance in cognition that was apparent. By giving more explicit instructions to support questions posed, the generation of original and creative responses was enhanced, which was consistent with the findings of Harrington (1975).

It follows then, that cognition must also be considered as part of the underlying process. According to Mumford, Hunter and Byrne (2009), focusing on cognition has a greater effect than a focus on the approaches and interaction of individuals within a group. This idea is supported by Dollinger (2003), who found that a need for cognition was an important predictor of future creativity. Higher order cognitive skills, and therefore performance, can be enhanced by posing questions at different cognitive levels (Crowe, Dirks & Wenderoth, 2008).
The most widely accepted theory of cognition is that of Bloom, Engelhart, Furst, Hill and Krathwol (1956). Their taxonomy identifies six levels of cognition: knowledge, comprehension, application, analysis, synthesis and evaluation, which according to Krathwohl (2002) represent a cumulative hierarchy. Because a person’s working memory is limited to holding approximately 7 chunks of information (Qaio et al., 2014), to be effective a dialogue should consider an issue progressively, taking into account the cognitive ability of participants. Accordingly, ensuring that a problem is explored by starting with questions about knowledge and then moving progressively to questions that require higher order cognitive skills will result in the mapping of an argument using a hierarchical structure, which will enhance the ability of participants to think critically (Mulnix, 2012; Kunsch, Schnarr & van Tyle, 2014).

The addition of a cognitive layer by mapping Bloom’s Taxonomy onto the Socratic model leads to a model with three dimensions:

**Process**
Exploration, examination, evaluation, election.

To aid integration of the dimensions I have renamed the 4 steps of the process using a single descriptive word for each.

**Questioning**
Concrete, abstract, creative.

**Cognition**
Knowledge, comprehension, application, analysis, synthesis, evaluation.

By understanding people’s different levels of cognition, asking a complex question too early can be avoided, thus avoiding confusing participants and ultimately frustrating the process.
These three layers of the model are represented in Figure 4.14, together with examples of appropriate question types.

Figure 4.14.

*4Es Socratic Model with question types and cognition levels.*

<table>
<thead>
<tr>
<th>Stage</th>
<th>Question type</th>
<th>Cognition</th>
</tr>
</thead>
<tbody>
<tr>
<td>Exploration stage</td>
<td>Concrete:</td>
<td>Knowledge and comprehension</td>
</tr>
<tr>
<td></td>
<td>What, where, when, why, who</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Explain, compare, give examples</td>
<td></td>
</tr>
<tr>
<td>Examination stage</td>
<td>Abstract:</td>
<td>Application and analysis</td>
</tr>
<tr>
<td></td>
<td>Consider, solve, apply (to a new situation)</td>
<td></td>
</tr>
<tr>
<td></td>
<td>What are the pros and cons? What is missing?</td>
<td></td>
</tr>
<tr>
<td>Evaluation stage</td>
<td>Abstract and Creative:</td>
<td>Synthesis and evaluation</td>
</tr>
<tr>
<td></td>
<td>What are the links between…. and …..?</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Defend your choice, justify.</td>
<td></td>
</tr>
<tr>
<td>Election stage</td>
<td>Decision and resolution</td>
<td></td>
</tr>
</tbody>
</table>
This table was used in the following dialogues as a quick reference to enable the facilitator to focus on the appropriate type and level of question at the right stage of the process.

4.10 Organisation 6

This organisation operates in an engineering-based manufacturing environment. The workshop was attended by five members from different departments who operate as a senior management committee.

4.10.1 Creative profile

Based on answers to the questionnaire this group had an overall creativity index of 35.8.

![Creativity Index](image)

Figure 4.15: Individual creativity index CO6
4.1.0.2 Discussion

The Socratic dialogue session lasted 96 minutes and finished with agreement on a follow-up action. The question posed was “What are our core competencies?” This group differed from other groups in that they were all senior representatives from different departments in the organisation and initially there seemed to be a fear of opening up and sharing ideas. As a result I rephrased the question and asked each person in turn about competencies in their own department and then opened up the discussion about each. Competencies and associated examples of them were:

- Heavy machinery:
  - big and small jobs
• range
• time and project management
• multiple shifts
• technical expertise
• ability to offer alternative solutions

• Fabrication:
  • in-house production saving time
  • ability to value-add

• People:
  • technical skills
  • mix of experienced and newly graduated working in teams
  • flat structure
  • can-do attitude
  • sales people with tech knowledge
  • problem-solvers

Participants were then asked to discuss key issues that needed to be resolved in order to maximise the value from each. Issues identified were:

• basic jobs tend to be price driven – need to examine sources/relationships with suppliers of raw materials and external “labour” to maximize price competitiveness

• while “value-add” is a core competency it is important that the company culture supports this throughout the organisation.

Participants agreed that the process was worthwhile in “in helping the team identify problems or challenges and form strategies to offset them”. It was also noted
that the workshop provided a non-threatening environment in which people from different departments could work together on a project. There was a general feeling that this type of meeting should be a regular occurrence as an open discussion like this was something that rarely occurred.

4.11 Theory Development - Stage 5

Initially, the participants were wary of the process but the more structured questioning process helped significantly in overcoming this and stimulating discussion. For example, at a concrete level participants had no problem identifying categories of competencies based on their current experience; however, when asked to give examples of these competencies they had trouble with more abstract concepts. By asking them to consider the issue from their clients’ perspectives they were subsequently able to come up with more creative answers.

This workshop served to validate the changes made after the previous workshop. It was also proof that the model is applicable to cross-functional teams – all previous groups were made up of members of the same department who worked together on a daily basis whereas the members of this group came together monthly and each represented a different department of the organisation.

However, this experience highlighted the need to be aware of group dynamics from the outset and have specific strategies to overcome any deficits. Kenny (2008) makes a distinction between a nominal group (such as this one) that is loosely formed, and a real group. Where a group has existing norms and strong connections between members they are more likely to develop a sense of collective consciousness where members become less defensive and more open, which leads to greater creativity. The result, according to Kenny, is “…enhanced communication,
facilitated coordination and flow in action, creative insights and problem solving, intuitive wisdom, and a sense of deep knowing and connection.” (p 597).

Therefore in dealing with any group, in particular a nominal one, it is first necessary to establish a sense of a shared common goal, which can be stimulated by engendering a desire to produce a practical outcome. Coupled with strong social ties this improves the likelihood of an idea being implemented (Baer, 2012). By focusing on this a sense of collective consciousness (and ultimately creativity) can evolve and create a sense that contributions are group ones rather than personal ones (Raelin, 2012). A facilitator can enhance this sense by fostering a sense of “flow”, which Csikszentmihalyi (1996) says adds up to an outcome greater than the sum of the inputs. This idea of flow also explains how a fully engaged team can perform at high levels regardless of the individual creativity of team members.

Csikszentmihalyi (2002) identifies two ways we can achieve flow, either by bending the environment to our will or by changing the way we think about it to avoid incongruity, which leads to a sense of defensiveness/self-consciousness that forms a barrier to integration. The loss of this barrier helps establish a more collegial feeling (Rufi et al., 2015), which in turn leads to greater creativity (Kenny, 2008).

Using a case study methodology, Hargadon and Bechky (2006) examined collective creativity in six organisations and found that collective creativity comes from a combination of help seeking, help giving, reflective reframing, and reinforcing behaviours. The resulting collective mind creates new meanings that lead to creative outcomes.

In reporting their findings they also highlighted the fact that the four behaviours above resulted in only fleeting rather than constant collective creativity. This would suggest that behaviour itself is not enough to maintain a sense of flow. It
also points to the need to have a capable facilitator who is conscious of group dynamics and can work on removing barriers. Tools available to a facilitator include providing positive feedback; reinforcing the common goal; encouraging story-telling; maintaining openness; and ensuring no individuals are left out.

Cropley and Cropley (2009) question whether there is a cause and effect relationship between personality and creativity that could instead be the result of experiences that remove roadblocks; for example, a reticent person who receives positive feedback that results in a positive psychology. Therefore taking a risk with positive results is likely to lead to a Pavlovian response (Charyton et al., 2009). The resulting mental state, such as increased motivation or elation, can effectively overcome deficits in the so-called creative personality traits. This is particularly apparent in Csikezentmihalyi’s (2002) descriptions of creative flow where engagement in a positive activity overcomes interpersonal and intrapersonal barriers. Positive feedback can also help overcome fear of evaluation, which is often a problem with group creative idea generation (Paulus et al., 2002).

A facilitator can enhance a sense of collective consciousness by a process of summing up at relevant points in a dialogue to show how new knowledge or understanding has evolved from the contributions of individuals to form a collective opinion (Raelin, 2012). Research has shown that personal storytelling, rather than increasing a sense of self, actually helps to develop a sense of consciousness or resonance (Levi, 2005).

Having a sense of a shared common goal also increases connections between group members, but Kenny (2008) warns that in nominal groups there are usually no existing group norms or connections so it is up to the facilitator to firmly establish an agreed common goal at the beginning of the process.
Openness to experience is key to the Socratic process because unless it is possible for an individual to reflect on their current thinking they will not be able to arrive at a potential solution to a problem. Support for this comes from McCrae (1987) who found a direct link between creativity and openness to experience; and Zhao et al. (2009) who linked the construct to entrepreneurial outcomes.

In an environment such as a workshop using a Socratic method, a facilitator can manage interactions so that openness and conscientiousness are enabled. This is consistent with Zhao et al. (2009), who, in a meta-analysis of relevant papers, found that both these factors are the ones most strongly associated with entrepreneurial intentions and outcomes. This is also consistent with Csikezentmihalyi’s (2002) conception of flow as a state requiring maximum engagement in an activity.

The need to focus on flow during the dialogue has been incorporated into the model as links between each stage. The model so far can be described as a black-box model, which Kotler (1967) says is one that doesn’t describe the specific linkages between two variables. In the case of the current model, the concept of flow can be used to link each of the stages.

The strategies described above can be incorporated into a guide for facilitators to ensure they are aware of ways in which a collective consciousness can be developed. This is illustrated in Figure 4.17.

<table>
<thead>
<tr>
<th>Stage</th>
<th>Question types</th>
<th>Notes</th>
</tr>
</thead>
<tbody>
<tr>
<td>Explore</td>
<td>Knowledge</td>
<td>Establish a sense of a shared common goal by beginning with a dialogue to establish agreement on the question itself. Focus on engendering a desire to produce a practical outcome that will improve the likelihood of an idea</td>
</tr>
<tr>
<td>What do we currently believe about the issue?</td>
<td>Knowledge what, where, when, why, who. Comprehension explain, compare, give</td>
<td>Establish a sense of a shared common goal by beginning with a dialogue to establish agreement on the question itself. Focus on engendering a desire to produce a practical outcome that will improve the likelihood of an idea</td>
</tr>
</tbody>
</table>
### Examine

**What evidence supports that belief?**

- **Application**
  - consider, solve, apply (to a new situation).
- **Analysis**
  - What are the pros and cons? What is missing?

During the examination encourage personal story telling, which will help to develop a collective consciousness. It is also a way to help members of the group to drop their defenses.

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### Evaluate

**What conflicting views are there?**

- **Synthesis**
  - What are the links between.... and .....?
- **Evaluation**
  - defend your choice, justify.

Positive feedback is another tool that can lead to increased group efficacy and is particularly important when seeking conflicting views. Focus on separating ideas expressed from the individual expressing them.

---

### Elect

**Where does this dialogue lead us?**

- **Decision and resolution**

Collective consciousness (and ultimately creativity) can evolve from a sense that contributions are group ones rather than personal ones. Enhance this sense by a process of summing up at relevant points in a dialogue to show how new knowledge or understanding has evolved from the contributions of individuals to form a collective opinion. This is particularly important during this final stage where you need buy-in to a group agreement.

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Figure 4.17: 4E’s Socratic model facilitator’s worksheet
4.12 Organisation 7

This organisation is a local government authority. The workshop was attended by three members from a single department. There was no team manager.

4.12.1 Creative profile

Based on answers to the questionnaire this group had an overall creativity index of 15.

![Creativity Index Chart]

Figure 4.18: Individual creativity index CO7
An analysis of the 3 categories of question produces an index of:

- Self = .33
- Supervisor = .27
- Climate = .30

This group reflected a very low score in self-reported individual creativity as well as a total lack of support for creativity in the organisation’s culture.

4.12.2 Discussion

The Socratic dialogue session lasted for approximately 65 minutes and finished with agreement on one follow-up action.

The question posed was “How do we improve efficiency in our planning department?” Issues raised all revolved around a feeling of a poor team culture. They were:

- No team development
- Little interaction to share experience
• No “quality” assurance

• Performance metrics don’t encourage innovation

The group felt that there were two structural issues that inhibited creativity:

• Treatment of planning apps must fit within guidelines

• Volume is an effective way of managing output.

This group was interesting in that the members had a very low individual creativity index but were very open to the process. The issue in this case was that there was no culture of creativity within the organisation and individuals felt that by themselves they could not effect change.

While all members of the group actively engaged with the process there was an overall feeling that any long-term change would have to come from the top. This group included members of a team but no supervisors. All participants felt that the Socratic approach would produce more creativity and innovation. This was clearly expressed by one participant who said: “With tolerance and support I believe I could be much more creative in the work environment and that the culture would also be much more positive.”

My overall impression was that if creativity were to be encouraged by management, these people would be keen to work within that environment. So even though there was a cultural issue, the support of management could overcome it and enable creativity to thrive. While the group felt that change must be driven from the top to be effective, the group agreed they could encourage more teamwork and sharing to improve both team culture and skills. Initially the group agreed to have a monthly meeting of their own to examine issues that arose with planning applications
during the month from the point of view of knowledge sharing rather than “defending” what had happened.

The addition of guidance to facilitators as recommended after the previous session proved to be of value in producing a sense of collective efficacy that was missing due to both low individual senses of creativity and a perceived lack of support for it at management level.

There were no new insights gained that called for any change or addition to the Socratic Model in its current form and the final conception of the 4E’s Socratic Model is illustrated in Figure 4.20.
4.13 Chapter summary

This chapter outlined and discussed the data collected and then described the open coding process used to develop the themes from which the grounded theory is produced. It also summarized the findings of individual workshops – all of which
concluded with a creative outcome. Following the results of each workshop, the implications of the grounded theory were also discussed and additions/changes made with reference to relevant literature.

This process resulted in a final model (Figure 4.20) that incorporates the Socratic process into a system for delivering creative outcomes in an organisational context.