4

Sensory Templates: Solving Unsolvable Managerial Problems

4.1 Sensory Templates

In the previous chapter, we learned that our understanding is largely metaphorical in nature and that we understand more abstract phenomena, including social situations, by seeing them as analogous to more concrete sensorimotor experiences. In other words, we use sensorimotor experiences as templates upon which we build our understanding of abstract phenomena. In the rest of this book, I will call sensorimotor experiences used in this manner *sensory templates.*

So what does it mean for our understanding of double-loop learning that our abstract phenomena are grounded in sensory templates?

In short, it suggests that double-loop learning has to involve change in sensory templates and that the difficulties related to double-loop learning described in Chap. 2 can be seen as emerging from trying to change the theories-in-use without directly addressing the sensory templates in which these theories-in-use are grounded. As long as a manager unconsciously represents "conflict resolution" through the sensorimotor experience of "pushing aside physical obstacles", then she will comprehend

theories about open dialogue, multiple stakeholder platforms, emancipation of suppressed voices, and shared decision-making processes as (nicely worded) means to push aside whatever she happens to see as obstacles. As long as a manager unconsciously represents "leadership" through the sensorimotor experience of "dragging objects", then he will relate to theories about servant leadership, appreciative leadership, coaching leadership, visionary leadership, and so on as (rhetorically pleasing) means of dragging his employees. It is fully possible to adopt the politically correct language without changing the sensory templates which govern one's behavior.

The split between espoused theories and theories-in-use can be seen as the result of managers adopting descriptions of theories of action without changing their sensory templates accordingly. Thus, assumptions about what sensorimotor experiences different organizational phenomena are analogous to are both some of the least explored and possibly some of the most influential assumptions managers base their thinking and decision-making on.

To illustrate how sensory templates work and the great effect our choice of sensory templates can have, I will relate a famous story from the world of physics. It is the story of how Einstein in 1905 explained the photoelectric effect by proposing that light, at least in some situations, is analogous to particles rather than to waves. Thus, in the words of this book, Einstein solved the problem of the photoelectric effect by proposing a shift in the sensory template physicists used to understand the phenomenon of light.

In 1887, Heinrich Hertz discovered the photoelectric effect. If you have two pieces of metal with a small gap between them, one of which is charged with an excess of electrons, the excess electrons will every now and then jump from the charged to the uncharged piece of metal. This is seen as a spark—or a mini-flash of lightning. When you shine light on the pieces of metal, you get more sparks, that is, more electrons make the jump—this is the photoelectric effect.

In 1887, light was understood as analogous to waves. That is, the experience of waves, like the ones we see in water, was used as the sensory template upon which physicists modeled their understanding of light. Using this sensory template, the photoelectric effect was explained as a

matter of the light waves hitting and pushing the electrons, giving them the energy needed to make the jump.

However, it was later noticed that shining very dim ultraviolet light on the metal would have a much larger effect than shining very bright red light on the metal. Using the wave analogy could not explain this. Bright red light corresponds to very tall waves (brightness) where wave tops are relatively far apart (color red). Dim ultraviolet light corresponds to very small waves (dimness) where the tops of the waves are closer together (color ultraviolet). It seems that the tall waves should be able to push more electrons than the small waves, regardless of color. Surfers let all the small waves pass by, and all of them are moved when the big wave comes. However, experiments showed the opposite.

Einstein solved this problem by assuming that light was not analogous to waves but rather to particles. He changed the sensory template used to model our understanding of light. Using the particle analogy, bright red light corresponds to many (bright) particles of light weight (red color). One can think of ping-pong balls. Similarly, dim ultraviolet light corresponds to few (dimness) particles of heavy weight (ultraviolet color). One can think of golf balls. Using the particle analogy, we can explain the photoelectric effect. You then think of the excess electrons in the charged piece of metal as tin cans. Throwing 10,000 ping-pong balls will not push over a lot of tin cans, but throwing just a few golf balls will push over at least one tin can per golf ball (if your aim is good).

Understanding light using *one* sensory template (waves) made the photoelectric effect appear as something unexplainable. Using a *different* sensory template (particles) made it possible to give a simple explanation of what was observed. Einstein's genius was that he questioned the fundamental assumption that light is analogous to waves. This shift of sensory template is what won Einstein the Nobel Prize, and it was a significant contribution to the foundation of quantum mechanics.

This story can inspire managers to ask the question: How many seemingly unsolvable organizational problems could be solved through a similar shift of the sensory templates used to understand various elements of the problematic situation?

When listening to managers speak, it is often possible to hear which sensory templates they use. A manager may speak about "negotiations" as

analogous to tug-of-war or assembling a puzzle. Managers may speak about "motivating employees" as analogous to carrying a heavy object or to removing obstacles blocking the flow of a river. Managers may speak about "decision-making" as analogous to making many objects move in the same direction or to the act of cutting through something. Managers may speak about "administrative tasks" as analogous to physical structures restricting their physical movements or to physical structures supporting their bodyweight. Managers may speak about "the team of employees" as analogous either to a united wall they need to push against or to a collection of objects with individual properties.

These ways of speaking are, as we saw in Chap. 3, not merely poetic adornments, but rather they reveal the managers' core assumptions about analogy between various organizational phenomena and sensorimotor experiences. That is, they reveal the managers' sensory templates. These sensory templates greatly influence how managers perceive various organizational phenomena and what sets of actions managers are able to imagine.

4.2   How Managers Use Sensory Templates

From 2010 to 2014, I did my doctoral work at Cranfield School of Management, UK. Sixty managers from 50 different organizations participated in this research. All participants had at least three years of experience as managers with employee responsibilities. In addition, many of the participants had held positions as project managers before they attained their first managerial position with direct employee responsibilities. There were participants from all levels of management, from line management to top management. The organizations included private sector, public sector, and hybrid sectors, such as privately owned organizations involved with public service tasks.

At the beginning of the research, all participants were asked to select a problem they were facing in their work as managers which they found to be of utmost importance and which in spite of their serious efforts to

solve it had remained unsolved. The benefit of working with problems which at the beginning of the research seemed unsolvable to the individual manager was that if managers at the end of the research had found *any* way of dealing satisfactorily with the problem, this would provide strong evidence that participating in the research intervention had resulted in a qualitatively new approach to dealing with the problem. In contrast, if the manager at the start of the research merely saw the problem as difficult, but not impossible, it would be much harder to determine whether changes in the way the manager perceived and engaged with the situation represented a qualitatively new approach or merely an improvement on an approach the manager had already used.

The managers formulated problems such as: How can I motivate employees who are always complaining? How can I make sure that managers from other departments commit to the decisions taken in the management team? How can I keep my highly skilled employees once they are good enough to start their own business? It was interesting to notice that most unsolvable problems the managers encountered were people problems—not problems about finance, marketing, product development, and so on.

Next, the managers were divided into three groups. In groups one and two, the participants used two different art-based methods to explore their problems. Group three was a control group where the participants did not explore their problem through any intervention. All managers were interviewed at the beginning of the research and again about one month after any intervention. These interviews were compared to test whether the participants had changed their perception of the problem and their approach to dealing with it. I will describe the interventions in more detail below. A full description of the research design used, a variation of Solomon Four Group design (Solomon 1949), is published in my doctoral thesis (Springborg 2015).

The data was analyzed by comparing two measures:

1. Changes in the sensory templates the managers used to represent their problem—insofar as these were visible in the managers' language and/or artistic creations.

2. Whether or not participants in the final interview reported that they had found new and successful ways of dealing with their problem and could back up this claim with concrete examples.

The main results of the research can be summarized in four points:

Changing sensory templates can solve seemingly unsolvable problems: Changing the sensory template a manager uses to understand a problematic situation can change this situation from a severe and seemingly unsolvable organizational problem to a relatively simple situation the manager can easily deal with. Merely changing the metaphor a manager uses to speak about the situation, *without* changing the underlying sensory template, does not lead to solutions.

New sensory templates can emerge from aesthetic elements outside the method: Through art-based methods, managers can find new sensory templates by engaging with photographs, drawings, and poetry. However, other aesthetic elements of the learning context, beyond those the method provides, can also be the source of new sensory templates. This can be highly unpredictable. It indicates the importance of educators paying attention to aesthetic elements of the learning context in a broad sense, such as the feel of interpersonal connections, seating arrangements, and the sensory templates from which the educator acts and speaks.

Letting go of non-essential parts of sensory templates: Changing the sensory templates managers use can be achieved by learning to perceive the individual parts of the sensory template they are currently using and changing from using the composite sensory template to just a single essential part of this template, that is, by letting go of non-essential parts of the sensory template they are using. Such changes in sensory templates seem to make managers become more courageous, patient, kind, and humble. This observation becomes important in Chap. 6 when dealing with the link between sensory templates and spiritual virtues.

The trap of "more clarity": Managers will sometimes report that a learning intervention has given them more clarity about the situation. This is generally considered a positive outcome of a learning intervention. However, if no change of sensory template has occurred, and the problem remains unsolved and (seemingly) unsolvable, such clarity can be a

negative outcome. When increased clarity does not lead to solutions, it can lead to managers being stuck in (clearly understood) perspectives which prevent them from acting efficiently. Thus, perceived increase in clarity is not necessarily good.

Below, I present a series of cases illustrating these four main findings. I will describe the cases in some detail. It is my hope that such detailed description will help the reader empathize with the manager and make palpable the process each manager experienced as their unsolvable problem transformed into a solvable one. Furthermore, I have included a fairly large number of cases. For the academic reader, some examples can be skipped as a few suffice to illustrate the ideas put forward. However, beyond their illustrative function, each case represents a general managerial problem, and it is likely that the reader who is a practicing manager will find among the cases some which they themselves have struggled with in their own organization. Reading a detailed account of a shift in perspective may enable such readers to make a similar shift for themselves and harvest similar benefits as the manager who participated in the research. Finally, detailed accounts of the learning journeys experienced by several participants in the research are also useful for scholars interested in critically evaluating and reinterpreting the research.

4.3   Changing Sensory Templates Can Solve Seemingly Unsolvable Problems

One group of managers who participated in the research was asked to create metaphors for their problematic situation. Asking managers to create new metaphors for various aspects of managerial work is a well-known way of using art creation in management education (Taylor and Ladkin 2009; Wicks and Rippin 2010). As described in Chap. 3, using different metaphors to look at an aspect of managerial work is like looking at it from different vantage points. It enables managers to see new things which may help them in their work.

For this group, there were no restrictions on the types of metaphors created. As a warm-up exercise, the managers were asked to pick a person they knew well and answer questions such as if this person were a fruit/

building/temperature/blockbuster classic, what fruit/building/temperature/blockbuster classic would he or she be. This exercise was repeated using familiar places such as a summerhouse, a lake, or the driver's seat of a car, and familiar activities, such as a child's birthday party, taking a shower, or running in the morning. The point of this exercise was to give the managers a clear understanding of what metaphors are and how different metaphors highlight different aspects of the phenomenon they are used to describe.

The managers would then create a number of metaphors for their problematic situation, pick the one they found most interesting, and develop it through a series of exercises into a poem, several photographs, and a drawing.

Developing new metaphors for their problematic situation would sometimes give the managers a new perspective from which they could easily solve the situation. However, this would only occur if the new metaphor was based on a *different sensory template* than the sensory template the managers normally used to comprehend the situation. The following cases illustrate how changing the sensory template through which a manager comprehends a situation can transform seemingly unsolvable situations into situations the manager can easily deal with.

The names of the managers in the following examples are not their real names.

4.3.1   Case: Collaboration Between Departments: Coordinated Movement vs. Connection

One manager, Anna, faced a problem many managers who work in silo-based organizations will be familiar with. For a couple of years, Anna had experienced problems in collaborating with the other department managers. At our first meeting, she formulated the problem in the following way: How can we ensure common commitment to the decisions agreed upon at our meetings, given that the different managers have very different ideas about what management is? Anna was a department manager in a public sector organization. She had six years of experience as a manager and 13 employees in her department.

Anna experienced that the managers in the other departments acted in the interest of their own departments before they acted in the interest of the organization as a whole. This attitude manifested in several ways. First, she experienced that she was not always kept informed about issues concerning her department until after the events. She felt that such withholding of information was a way the other department managers maximized their own influence in the organization and that they used this influence for the good of their own departments. Second, she experienced that some of the other department managers were not loyal to the decisions that were made during the meetings of the management team. In particular, these department managers would agree to decisions about what to communicate to the employees during a meeting, but after the meeting they would go out and communicate something else in their own departments. She believed that this difference in communication, at least in part, was due to the individual managers' different ideas about what management is. Anna herself saw management in a public sector organization as a matter of giving employees autonomy and challenging politicians' decisions about what the organization should do whenever her professional expertise told her there was reason to do so. Anna believed that some of her management colleagues saw management in a public sector organization as a matter of controlling employees and carrying out the orders of the politicians without question or error. Anna believed that one reason the actual communication to the employees in the different departments lacked coherence was that the decisions about what to communicate to the employees were filtered through these opposing ideas about management. Therefore, she lamented that at meetings the management team would speak only about the concrete problems in the organization and never about their different basic attitudes to management. All of these circumstances made it difficult for them to find common ground and Anna believed that the problem was this: How can we find common ground to work from?

To understand what Anna means when she says this, we need to know what dominant sensory templates she uses when posing this question. We can get a sense of this by listening to her language when she

spoke about the situation and by looking at the artwork (poem, photographs, and drawing) she produced to describe the situation.

When Anna spoke about "finding common ground", she used the Danish words "finde fælles fodslag", which literally translates into "finding a common beat of the feet". It refers to walking in time with each other and to the sound made when many feet hit the ground in a synchronized way. This choice of words tells us that Anna is using the sensory template of coordinated movement to understand what she feels is missing in the management team. When Anna took pictures to illustrate the problem, she took pictures of trains moving in opposite directions. Such pictures reveal the use of the sensory templates "goals are destinations in physical space" and "common action is coordinated movement".

Using these sensory templates to understand the situation, Anna asked questions like: How can I make sure that the others are loyal to the decisions we make at our meetings? How can I make the others understand the importance of giving autonomy to the employees and valuing our professional expertise and challenging political decisions when they need to be challenged? Or in the words of the sensory template: How can I make the others align with my preferred direction? Even though Anna had tried for years, she had not managed to do this. There could be many reasons for this. First, Anna was slightly uncomfortable with her own agenda, since this agenda was, in effect, one of taking control and making others conform to her point of view. And even though she believed she was right and the others were wrong, she also realized that it was problematic to ask others to relinquish control over their employees if she at the same time tried to take control of how her colleagues should act. Second, trying to impose one's own view on someone else will often generate resistance in the other. Regardless of what the reasons were, the fact remained that the problematic collaboration with the other department managers had persisted in spite of all Anna's efforts.

However, among Anna's pictures, there was one picture of a scarf on a bench. This picture was particularly interesting because it did not contain any movement—and thus, no coordinated or uncoordinated movement. This was an indication that it referred to a different sensory template than the dominant one. When Anna spoke about this picture, she was at first unsure why she had taken it. Then she said:

It could be something about going in different directions. But it also looks a bit lonely. So, in fact, it is something about when one does not have this common commitment then everyone stands a bit lonely. And this I hadn't thought of.

Here we see a different sensory template emerging. At first, she tries to understand the picture in terms of the dominant sensory template, but then she recognizes that something else is going on. It is about separation vs. being together (Fig. 4.1).

As Anna started talking about the situation using this sensory template she saw the situation from a completely different vantage point. And just like in Gareth Morgan's *Images of Organizations*, this shift of vantage point gave Anna a number of new insights about the situation. First, she noticed that her emotion changed. Instead of an underlying atmosphere of anger (why can't they see they are wrong?), she felt an underlying atmosphere of sadness (maybe we all feel isolated, sad, and lonely in

Fig. 4.1 Anna's picture of a scarf on a bench

this). Second, Anna realized that the problem was not a problem of *lack of commitment to decisions* made in the management team, but rather a problem of *lack of relationship* between the managers in the team.

The instant she realized this, she remembered that the first thing she did as a manager when she got a new team of employees was to make sure that they formed good relations with each other, for as she said, if they don't have good relations, nothing works. This realization was a great relief to her because she also realized that the toolbox she normally used to ensure that her employees formed good relations with each other, she could simply apply to the management team.

She put this into practice, and one month after the intervention she had achieved good results in terms of better collaboration with her management colleagues.

This example shows that when Anna shifted the sensory template she used to understand the problem she faced in collaborating with her management colleagues, the problem changed from being something she could not solve to being something she already knew how to solve. When she saw the problem as analogous to "coordinating movement", she tried to impose her (correct) view on others and felt angry that they could not understand and that they were uncommitted, and she could not find any means of solving the situation. When she saw the problem as analogous to "creating physical contact", she shifted her focus to building good relationships to her colleagues and felt sad, rather than angry, about the present state of affairs, and she felt encouraged to find that she already knew how to solve the problem.

4.3.2   Case: Motivating People: Sisyphus vs. Bicycle Break

Another manager, I'll call her Becky, was the COO of an organization with 30 employees. The organization was a non-profit, private sector organization which fulfilled a very specific administrative, public service function. Every second year, they had to renew their contract with the government to remain in charge of this administrative task. Becky had more than ten years of experience in management positions in different organizations, two of these in the current organization.

Becky had problems with the culture in the customer service department with nine employees, which she did not know how to solve. At our first meeting, she asked: How can employees in customer service understand and feel that they are an important and valued part of the organization? How can I raise their self-worth?

The employees in the customer service department were very frustrated. They told Becky that they felt they were the part of the organization that was least valued and that employees in the other departments had the opinion that the customer service employees were easily replaceable. They felt that the others did not understand what they did for the organization and how difficult their tasks were and therefore did not show them any consideration. Due to this frustration, the customer service employees had a harsh tone both in their communication with other departments and internally among each other. And it influenced the way they spoke with customers.

Becky saw this culture of frustration as a severe problem for several reasons. First, the way customer service speaks to customers greatly influences the image customers have of the organization. Second, the organization's permission to administer the particular public service which was the sole base of the organization's existence depended on a satisfactory performance by the customer service department. Third, the frustration of the nine employees generated a lot of noise in the rest of the organization. It had a negative impact on the general working climate, and it took up much time in the management meetings.

Becky described employees in the customer service department as extremely competent. The work in the customer service department was repetitive and stressful. They would deal with the same issues every day. Customers would mainly call the customer service department when the customers were frustrated. And there was an intense time pressure because a part of the requirement for the organization's permission to administer their public function was that their customer service department answered 95% of all calls within 20 seconds. Many of the employees in the department had been there for eight to ten years, which is uncommonly long for a customer service department. Becky saw that this made them both extremely competent and very set in their ways.

When she spoke about the problem, she described it as a kind of Sisyphus work. Raising the employees' self-worth or sense of being appreciated was like pushing a boulder up a mountain only to watch it roll back down. This description was a direct description of the sensory template Becky used to comprehend the situation.

Using this sensory template to comprehend the situation made Becky ask questions like: How can employees in customer service understand and feel that they are an important and valued part of the organization? How can I raise their self-worth? She had tried many things to raise the employees' self-worth and sense of appreciation, including investing in new equipment, giving them communication courses, arranging events where they could tell the employees from the other departments about their work, and so on. However, it seemed impossible to keep the boulder from rolling back down the mountain.

During the workshop, Becky took pictures, wrote a poem, and made a drawing to illustrate the situation. From this work emerged an alternative sensory template. To illustrate the problem, Becky took a picture of a bicycle wheel. When she spoke about this picture, she said that the problem was also like riding your bicycle with the hand brake on: There is friction in the system.

Using this new sensory template to understand the situation, Becky began to ask: Where is the friction? Asking this question, Becky found a very interesting answer. The friction was created by the department manager, and not by the employees' lack of self-worth. She realized that the manager of the customer service department demanded that all decisions should be approved by him. Thus, the employees were not allowed to make decisions that they were fully competent to make. This gave them very little influence on their own work life and contributed to their frustration and sense of not being valued. However, they were very loyal to the manager and had not talked about this as a problem.

This made Becky realize that she could deal with the situation simply by talking to the manager about his leadership style and insisting that he would give more responsibility to the employees and in this way acknowledge their competency and value them. She was very relieved about this realization. In our last interview, she said: "It's a completely different issue, than what I thought it was… it is much more accessible and tangible".

This example shows that when Becky changed the sensory template through which she understood the problem about the frustrated customer service employees, the issue changed from being something unsolvable to being something that was easy for her to solve.

4.3.3   Case: Changing People's Mind. Water vs. Viscous, Sticky Caramel Mass

Catharine was a manager in a large multinational corporation which had business units operating in several countries. Catharine had five years of experience as a project manager and one and a half years experience with people leadership. At the time of the research, she had a team of six employees for whom she had the formal staff responsibility plus 20 employees for whom she was project leader. Catharine was part of a central unit whose function was to support the business units. The central unit developed plans, got them approved by the board, and sent them to the business unit for implementation.

Catharine described a classical problem which many managers in organizations with strongly centralized structures will recognize. In short, the people in the central unit feel that the people in the business unit, who are tasked with implementing the plans, are ignorant and unqualified. And the people in the business unit think that the people in the central unit are arrogant, don't know what is really going on at the front line, and therefore make bad plans. Thus, the people in the business unit would rather make the plans themselves. Catharine had noticed that this sort of power struggle occurred not only between the central unit and the business unit she was in charge of but between the central unit and business units everywhere. She had also noticed that the struggle was never present in the meetings between technicians, but only at the managerial level—starting at the first managerial level of team leaders. Catharine saw this as an eternal, unsolvable tension.

At the time of the research, Catharine's team had made a catalogue of the projects in the business units assigned to her, evaluated the worth of each project based on analysis of collected data, and made decisions about which projects to invest in and which to close down. According to this work, nine out of ten projects would never give any return on investment.

However, the people in the business unit thought, according to Catharine, that their projects were worth much more and that they should go ahead with practically all of them.

Catharine's problem was that the business unit had begun operating too autonomously. They had disregarded the analysis made by the central unit and had already begun, without any authorization, to make investments to develop the projects they themselves believed in—including making their own analyses, buying land, and negotiating with local authorities. Furthermore, they had hidden these activities from the central unit. Catharine didn't know how to stop the business unit from spending money on developing these projects, which according to the analysis would cost the organization more than they could eventually earn from the project. Catharine saw the problem as consisting of two parts: first, how to make Unit A listen to reason and, second, how to shut down the projects (their dreams) and still preserve a working relationship with Unit A.

Catharine felt she had been given two roles which were impossible to hold simultaneously. On the one hand, she was supposed to be the police looking with critical eyes at the business unit to ensure quality. On the other hand, she was supposed to support the business unit, and the organization had in recent years adopted "collaboration" as an explicit value, to temper an egocentric and competitive organizational culture. Catharine described it as follows: "It's just not ok to have conflicts in the organization. In the old days, it was. Then it was management by conflict. But in the new organization, it is not. In the old days, everybody was bitching. But now: No. Everybody's happy. Conflicts are an ugly thing". Having good collaborations was a key performance measure with an impact on managers' bonuses. This created a dilemma for Catharine. Alone she was unable to stop the business unit from wasting resources on projects which would ultimately lead to losses for the organization. So in order to not fail in her role as police, she would have to engage higher levels of management. However, this could be seen as telling on the business unit and thus exposing that she was unable to maintain good collaborative relationships with the business unit. Furthermore, Catharine felt that being a woman in a male-dominated organization increased her risk of being seen as someone unable to collaborate. She felt she needed to be careful about expressing negativity: "It's not good to be emotional as a woman in

a male-dominated organization. As soon as the voice becomes a bit shrill their ears close". Due to all of this, Catherine saw her two roles as impossible to unify and thus she felt the organizational structure was flawed and could never work.

During the workshop, Catharine explored which sensorimotor states she used to comprehend the situation. She discovered that as an engineer, she liked to solve problems quickly. She was used to working in a laboratory where she could set up experiments, make her measurements, and immediately see the results. There was no inertia in this movement. So because she saw the evaluation of the projects as a purely technical problem which had already been solved, she could not understand why the people in the business unit did not move without inertia.

However, talking the whole thing through, she realized that the business unit, although unrealistically optimistic about their projects, also embodied values such as entrepreneurship, being visionary, making things happen, and doing something good for the local community. Even though she believed that the business unit was acting blindly and wrongly, she admired these values and even preferred them to the values embodied in her own role, such as being conservative and controlling. She could also understand the frustration the business unit felt toward the central unit. Through these talks and through her work with capturing the sensorimotor states she used to comprehend the situation in photographs, poetry, and drawings, she came to feel the problem as a human problem, which felt like a big, viscous, sticky mass and which, unlike technical problems, could *not* be moved quickly. She described this shift in perception in the following way:

> I saw the whole problem as this big, fluent, viscous, caramel mass. And that is not something you move quickly. It is something you slowly push and work on in a calm way… I'm used to fixing things quickly. Bam, bam, bam. Problem solved. Duk, duk, duk. But now I see that this is not like a glass of water, you can pour into another glass and then it's gone. It is this big, viscous, fluent mass, which is constantly changing shape, which you just have to approach in a calm way and work with step by step… Now I don't expect that it is a mass you can just shape and move. I accept that it is eternal and big and viscous and sticky and that one just have to work with it in a calm way [laughs].

This change in sensory template brought many changes in Catharine's behavior and general feelings relating to the problem. Instead of seeing her situation as a result of a flawed organizational structure, she accepted the challenge:

> It has become an OK problem, 'cause it's part of my job. Before it was more like, fuck those fools, I'm an engineer, and I shouldn't deal with this shit. But now it's like: Yes, I'm an engineer, but I also have to deal with this, 'cause it is my job, and it is not just them who are stupid. When you think about it, it is just like this. It is complex, and it is people.

She experienced a calm and *relaxed patience* with people. She now saw it as unrealistic to think that she could go directly to the business unit and tell them what to do and expect them to simply do it. Instead, she would build up an atmosphere in many people which would then slowly reach the people in the business unit—working on them from many sides. She no longer got upset if her attempts did not work immediately. She would instead just try out different things. And she no longer felt the fear of being seen as a hysterical woman or as bad at collaborating when she pointed out the faults in the business unit's behavior to higher levels of management. She felt that she could deal with the conflict without either becoming emotional and unprofessional or staying quiet and losing herself. She described this new view on "conflict" in the following way:

> If you go after the person, it is ugly. But if you just go on in a more zen-like and calm, this-is-my-job, go-for-the-projects kind of way. Then it is not ugly. Then it is what I do. It's what I get paid for.

In short, through her work with technical problems, Catharine had come to understand problems as something with little mass and no stickiness, which could be moved quickly—like water. This made her frustrated when the people in the business unit refused to act in a reasonable way even after the technical problem had been solved and the data clearly showed what to do. When she changed this sensory template and began to understand the problem as a big, viscous, sticky mass, she realized that she had to work on the business unit from many sides and she gained the

ability to work in a relaxed, patient, and calm way without using blame. She would simply present the data for many people to build up a general attitude which would then reach the people in the business unit. This worked. At the time of the second interview, the business unit had dropped the projects she wanted them to drop and focused their resources on the one project that would be profitable.

4.3.4   Case: Generating Sales: Pulling the Cart vs. Weaving Nets

Dorothy was a self-employed consultant. She had over ten years' experience in different leadership roles. She had worked extensively with art and theater and among other things she had been the head of a large yearly festival of children's theater. For a couple of years, she had been away from the world of theater, but two weeks before the research, she had been hired as administrative leader by a children's theater to help them sell their performances. This theater used to sell 100 performances a year, but recently this had decreased to 30 performances a year. They did not know why. They had considered possible reasons, such as whether their recent plays were not as good as their previous plays or whether children's theater simply no longer had a place in today's society.

Dorothy's problem is the common managerial problem of being handed a business with failing sales and no clearly identified reason for the decline. It is the problem of being a new leader hired to turn an organization around. To some managers such a task is exciting, and they may even specialize in this kind of work. To others, it is one of the scariest scenarios, and they would never take such a position. Dorothy's story also touches on the classical manager trap of doing things themselves when tasks seem too big and complicated to delegate.

Dorothy believed the reason for the decline in sales was related to a recent municipal reform. In Denmark there are around 140 children's theaters. These theaters deliver many of their performances at schools and similar institutions, and they are usually hired by coordinating employees in the municipalities. Many of these coordinating employees are individuals working in the municipality who happen to have a passion for

children's theater. They are people who believe in the importance of children being exposed to theater as part of their development. They are the champions of children's theater. During a municipal reform in 2007, many municipalities were joined, and many of the employees who had previously hired the children's theaters were either moved to new functions or were let go. Thus, the theater lost many of their most important connections who had generated sales for them. Dorothy did not believe that the time for children's theater was over. Before participating in the research, she had visited a festival for children's theater after having been away from the scene for five years. Out of the 100 theater groups represented at the festival, there were 20 she didn't know, which had emerged within those five years. One of these groups delivered a performance which Dorothy considered among the ten best performances she had ever seen. Thus, even though Dorothy in the initial interview saw the situation as very bleak, she did not believe that the product itself was the problem.

At the start of the research, Dorothy said she felt the problem was "an impossible wall" in front of her and that she felt she was hired to "pull the cart on her own". These two statements revealed the sensory templates she used to comprehend the situation. First, she saw the problem as *one thing*, a wall. Second, she saw herself as the sole agent who needed to somehow solve the issue.

Dorothy experienced an important shift when she became conscious of these sensory templates. She realized that the owners of the children's theater who had hired her expected her to generate the sales on her own. Knowing very little about sales, they imagined that she, being the expert, could come up with a magical formula that would solve their problems. And she realized that she had bought into this view. This was a big eye-opener for her. Immediately upon this realization, another set of sensory templates came into play. She began speaking about herself as someone who was not going to pull anything, but as someone who was going to activate a whole network of people. Thus, the problem was no longer one thing, but many, namely how to activate individuals one by one in a collective effort. Similarly, her task was no longer moving something but rather creating connections or weaving a web between individuals who had both resources and an interest in doing something about the declining sales of children's theaters.

Thus, after the workshop, Dorothy began activating all the people she could imagine would be interested in solving this problem. First, she created a workshop for all employees in the theater group about sales. In the workshop, she presented very basic and simple ideas about dividing customers into different segments and clarifying what to say to customers within each segment and so on. The theater people became excited about Dorothy's systematic approach to sales. One employee changed from viewing sales as something she'd never do to actively asking Dorothy for more leads to follow up on. This already brought results. By the time of the last interview, the performances they had worked with were almost sold out. Due to the positive results, they had been talking about involving a few more theaters in a combined effort. Second, she realized that she herself could not produce a grand analysis of the effects of the municipal reform. Therefore, she contacted students and teachers on the faculty of theater science and sparked their curiosity in investigating the problem as part of their university assignments. Third, she contacted a department in the ministry of culture that offers mini-educations to students in schools so they know how to receive performances at their school, that is, telling them what information the janitor at the school needs, which facilities are important for performers, and so on. Fourth, she connected with a governing body which gives money to cultural programs and made them interested in investigating reasons for the declining sales. Given Dorothy's extensive experience with the theater world, she, more than anyone, had the overview of who had resources and were interested in joining in a collective effort to raise the declining sales for children's theaters.

In short, Dorothy changed the sensory template she used to understand the problem. Before the workshop, she saw the problem as one thing (an impossible wall), and she saw her task as pulling the cart alone. After the workshop, she saw the problem as consisting of many small tasks of one by one finding, activating, and connecting all the individuals who had both resources and an interest in doing something about the declining sales of children's theaters. Dorothy's shift in sensory template is similar to Anna's shift. Like Anna, Dorothy changed from a sensory template of moving things in a certain direction to a sensory template of creating physical connections. Where Anna spoke about creating one-to-one connections, Dorothy spoke about weaving a web of connections. Dorothy's

shift in sensory template was also similar to Catharine's shift. Both were faced with something which seemed immovable—an impossible wall and an obstinate business unit. Both changed from thinking that their problem was finding ways in which they personally could move the immovable thing, to thinking that their problem was how to engage many individuals with resources and a common interest in dealing with the problem.

In the last interview, Dorothy said that the workshop had been a profound personal development for her. She recognized that throughout her professional career she had tended to do things herself instead of delegating—often realizing the need to delegate too late. She described the change in the following way:

> Your methods have helped me to catch a management mistake I've suffered from many years, which is 'now, I'll deal with everything myself.' I've been a leader several times, where I really have to be able to delegate. And I do it, but often too late. I try to solve everything myself. And I became keenly aware of this. It was the image of myself as a magician… tall hat and magic staff and a hand with a white glove: 'Wiiing' and then there had to be a solution. And that image became key for me. I can feel I'm about to jump into that trap when I can detect a certain internal panic: Gosh, this is a big problem. Now it's getting immense and difficult. But then I think: You are not a magician…. And then I see this open field with scattered rocks here, and there and I go and choose one at a time. Who am I with now and what can they do in relation to this rock if we turn it over? … And it may sound like this is just leadership, but for me, it is a personal process of catching that panic when it arises. And then be analytical instead of panic stricken: It is not a big wall, it is a field, and there are some rocks that need to be turned. Look out over the field!

This quote also shows that when Dorothy saw the sensory template she used, *she could let go of it and let another sensory template emerge.* In Chaps. 6 and 7, I will return to the importance of learning to become conscious of sensory templates as a way to let go of using them.

At the end of the research process, Dorothy told me that when she came, she had thought that it would be nice to talk through the problem, but that she was certain it would not solve anything. However, she now

estimated that the activities she had initiated after the workshop might not get the sales back from 30 to 100 performances a year, but that they would increase the sales to 60–70 performances a year. She was very surprised at this outcome. Such surprise was very common among the participants who experienced that their problem transformed from unsolvable to accessible.

4.3.5   Case: Managing Complaints. Employees as One Group vs. Many Individuals

Einar was a manager in a government administration. He had been in this position for three years, and it was his first job as a manager with employee responsibilities. Einar had worked ten years as a project manager. He led two teams. One team consisted of five employees with shorter educations who took care of operations. The other team consisted of eight employees with longer educations who took care of development tasks.

Einar's problem was yet another problem that many managers will recognize. The employees in the operations team expressed dissatisfaction with a variety of things. Einar listened to them and felt he did everything in his power to make changes so these employees could be satisfied with their work life. However, instead of appreciating his efforts, the employees simply found new things to complain about or found flaws in the solutions he came up with. Many managers will at some point in their career have encountered groups of employees who seem more interested in complaining than in solving the things they claim to be unhappy about and moving on. This culture of complaining generated an atmosphere which affected employees in both teams negatively. Einar had even had one employee who felt so distressed about the situation that she didn't want to come to the workplace. Einar felt lonely and resentful in this situation.

Einar had observed that the employees in the development team were motivated by their vocational challenges and successes. They appreciated being given autonomy in their work, and they handled this autonomy well. Thus, it was easy for Einar to understand what these employees needed in order to thrive and be productive. The employees in the operations team,

on the other hand, seemed to have a greater need for Einar's active involvement, but Einar found it difficult to understand exactly what these employees needed in order to thrive and to be productive. He would listen to their complaints for clues, but it seemed to him that they did not tell him clearly what they really wanted and needed in order to be satisfied.

Much of the dissatisfaction the employees in the production team expressed was aimed at things which Einar could not do anything about. For example, some of the employees in the production team were dissatisfied with doing the work they were doing and would instead like to do the same kind of work their colleagues in the development team were doing. However, these employees lacked the qualifications, both in terms of education and experience, needed to do the work of the development team. Furthermore, Einar needed them to do the work he had hired them to do. Another type of complaint which Einar saw as something he could not do anything about was lamentations about how much better things had been in the old days. Adding to this, Einar observed that the employees in the operations team would often read events in a negative way. If, for example, he brought ice cream for everyone one day, instead of seeing this as a positive thing, they might see it as an underhanded management intervention aimed at manipulating them. Similarly, if he held a meeting to inform his teams about developments in the organization, the employees in the operations team would often complain that they had not been informed earlier—regardless of how quickly he informed them about matters. Thus, the complaints of the employees in the production team did not give Einar a clear idea about what they needed in order to thrive and to be productive.

Einar had a genuine wish to bring out the best in his employees. He wanted this not merely for the sake of scoring high on the job satisfaction surveys and having productive employees, but also out of care for his employees and a desire to see people thrive. However, he felt the employees in the production team made it difficult for him to help them thrive. Einar resented the above-mentioned complaints as he found them unfair "cheap shots". He felt such complaints were doing nothing good and that they were needlessly poisoning the workplace climate. On the one hand, he wanted people to tell him if something really bothered them so he could do something about it. On the other hand, he didn't want to spend

time on the kind of complaints he felt were complaints for the sake of complaining. At the start of the research, Einar stated that his problem was how to raise the morale of employees in the operations team by setting aside their negative attitude and *complaining less* about things they could not do anything about and instead adopting a positive attitude and focusing on improving the things they could improve.

During the workshop, Einar captured the sensorimotor states he felt in the situation by taking pictures of glass walls, a sign with the word "reserved", and a vending machine with candy behind a glass. Einar said:

> First I took a series [of pictures] which all have the same theme. Loneliness and prohibition and not being able to penetrate. Not being able to get in touch with the core of the problem, but more touching symbols and artifacts around it… What I'm dealing with is a bit of a closed party, where it is difficult to penetrate to the core.

Einar further explained that he felt there was something attractive and promising and even loving that he was trying to bring out in the open, but that the production team was like an impenetrable wall blocking all his attempts. This made him feel lonely and resentful. He felt the employees "cheated him out of realizing his positive intentions". He felt the whole thing was like an obstacle race or like a drawn out game of hide and seek.

While speaking about his art creations, Einar said:

> My drive—the wish I have—is that I believe in the good in all people, believe that people have meaningful motives for doing what they do. Therefore it's about *reaching* this. What drives them? *Find it and cast light on it and make it object for awareness*. But… I'm no oracle—so it is necessary that people (…) somehow show: this is where we are. If it is hundred meters *steeplechase* in *hiding,* then it is impossible to find what drives people. And then I get cheated out of my good intentions, and the other part plays with *covert cards*.

When we look for sensory templates in the above quote, we see three in play (and that Einar was a master of mixed metaphors). First Einar uses the sensorimotor experience of wanting to reach something attractive

that is kept from his reach by a barrier—like chocolate behind the glass wall of a vending machine. The use of this sensory template is visible in Einar's use of words like "penetrate" or "wall" (in the previous quote) and in the picture of the vending machine. But Einar also uses another sensory template. This is visible in his use of words like "finding", "hiding", "cast light on", and "make it object for awareness". These words seem to refer to the sensorimotor experience of things coming in and out of one's vision. If the light is switched off, he cannot reach what he wants, not because of a barrier, but because he cannot see it. When he says "find it" rather than "reaching it", he introduces the notion that, unlike the chocolate behind the vending machine's glass wall, the thing he is reaching for is invisible to him. When Einar talks about playing with "covert cards" he adds a further layer to the sensory template, namely an *agent* that deliberately keeps the thing he is reaching for hidden. Einar speaks about this agent as being "the production team". That he speaks about *one team* shows that he uses the sensory template of "one entity", to understand this agent.

These three sensory templates structure Einar's perception of the problem and determine the set of actions he can imagine. This first layer of the sensory template is "wanting to reach something attractive that is kept from his reach by a barrier". Einar imagines a scenario where the employees are thriving, and there is a good (and even loving) work climate. This scenario/climate is what Einar is reaching for. The complaints of the production team are the barrier Einar needs to penetrate to get to the attractive scenario/climate. Therefore, Einar tries to get rid of the complaints—by resolving the ones within his power to solve and encouraging the employees to stop complaining about things that are impossible to change. Given the sensory template of wanting to reach something attractive that is kept from his reach by a barrier, these actions make perfect sense. The second layer of the sensory template is "reaching something that is not visible to him". Einar assumes that what he is reaching for is whatever would make the employees in the production team happy. Assuming that it is visible to *them,* he asks them to show it. This is what causes the resentment in him. Using the sensory template of reaching for something he cannot see, he resents that the people he supposes can see what he is reaching for will not tell him where it is—even though he is trying to do something in

their own best interest. The third layer of the sensory template is that the production team is one entity. This sensory template makes it appear to Einar that the production team is acting with one will and that the team is one entity hiding the thing he is reaching for. This makes him address the production team as one entity, for example by asking the entire team to complain less.

Even though no change in sensory template occurred during the workshop, in the last interview an important change had occurred in relation to the third layer of the sensory template. In the month between the workshop and the final interview, Einar had conducted the annual performance and development reviews. Thus, he had spoken individually with all his employees. Doing this, he realized that the production team was *not* one entity, but rather five individuals, who did *not* act with one will but (on the contrary) differed quite significantly in their views. He realized that only one employee was complaining and that the rest simply kept quiet and that he had, falsely, assumed that this meant they agreed. However, they did not. On the contrary, they were as tired of the complaining as he was. Changing from seeing the team as one entity to seeing them as five individuals with different opinions brought Einar a new way of engaging with the problem. Instead of encouraging the whole team to complain less, he began to encourage the quiet team members to voice their complaints. When the quiet team members began to speak, it was made clear that the general attitude in the team was not one of dissatisfaction with the organization, but dissatisfaction with the one person who was prone to complaining.

In short, when Einar changed from viewing the production team as one unit to viewing them as five individuals, he realized that the wall of complaints had been an illusion. He also realized that instead of trying to make the entire team complain less, a far more efficient approach was to encourage the ones who were normally silent to speak their minds about what bothered them. This changed the general atmosphere in the group.

Whereas this did not completely solve the situation, it did make it far more accessible to Einar as the production team no longer appeared as an impenetrable wall, but rather as five individuals—most of whom were quite content. Einar's case is interesting because he used three interwoven sensory templates and only changed one of these, which did not seem to

be central to his understanding. It is possible that Einar would have accessed even more efficient ways of addressing the problem if he had changed the central sensory template of wanting to reach something attractive that is kept from his reach by a barrier.

The five cases above are summed up in Table 4.1.

Table 4.1 Changes in sensory templates and their implied actions

Manager	Old ST	Old action	New ST	New action
Anna	Collaboration is coordinated movement	Force department managers to commit to decisions	Collaboration is physical connection	Buid relationships between department managers
Becky	The problem is like pushing a rock up a hill and preventing it from rolling back down	Tell employees how much they are appreciated and make employees in other departments understand the challenges of customer service to enhance their appreciation	The problem is friction—like riding a bike with the breaks on	Identify and remove the friction. In this case, the department manager's overly controlling management style
Catharine	People in the business unit are like water	Present the people in the business unit with the data to move them, and blame them if they don't move	People in the business unit are like a viscous and sticky mass	Calmly present the data for many people who can work on the business unit from many sides
Dorothy	The problem is an obstacle to be moved The problem is one entity	Solve the problem alone	The problem is to weave a web. The problem is many small rocks to be turned one at a time	Find, activate, and connect people with resources and interest in solving the problem
Einar	The team is one entity	Ask the team to complain less	The team is five individuals	Ask the silent members to "complain" more

4.3.6 Different Metaphor Based on Same Sensory Template Does Not Bring Change

In some cases, managers would change the metaphors they used when talking about their problematic situations, without changing the underlying sensory template they used to comprehend the situations. This did not lead to solutions for the problems like in the cases above. We can, for example, think of the task of motivating an employee as analogous to the sensorimotor experience of pushing something that resists movement. This is one possible sensory template. The sensorimotor experience of pushing something resisting movement can be part of many concrete situations, such as pushing a car that won't start, pushing a mule that won't walk, or pushing a big round rock up a hill. Therefore, we can speak about the problematic situation using words from many different source domains, that is, we can use many different metaphors without changing the sensory template we use to comprehend the situation. For example, talking about the act of motivating an employee by saying that it is like "trying to push start a car", or that the employee is like "a stubborn mule that won't walk", or that motivating the employee is like a "Sisyphus work" are three different metaphors, but they are all grounded in the same sensory template of pushing something that is resisting the movement. Changing metaphors without changing the sensory template has little or no effect on transforming the managers' perspective in ways that dissolve the problem.

One manager, Xenia, faced the problem of being the newly appointed head of a department with only 20–25 employees and two managers under her. This situation had arisen when two departments were merged and both managers kept in management positions. The employees were confused about whom to report to, and they resented that two positions in the department had been cut away, while the three management positions remained. Furthermore, the two managers had very different personalities and had basically divided the department between them—so it wasn't really merged. Xenia initially understood the situation as analogous to physical splits and forces pulling in opposite directions. She spoke about a split department, a split between rationality and personal agendas, a split between her desire to create an efficient department by letting one manager go and her empathy for both managers, and her split

between which manager to keep. In her artwork, she created many different metaphors, but all of them embodied this sensory template of split and forces pulling in opposite directions. She took a picture of a sculpture which was a cube cut from top to bottom; a unisex sign on a toilet door, with a pictogram of a man and a woman with a line between them; two dishes next to each other at the canteen counter, one traditional and one more experimental; and her drawing and poem both built on the metaphor of too many chefs in the kitchen and forces pulling in different directions. Even though Xenia produced many different metaphors, she did not change the sensory template, and, consequently, she did not find any solutions beyond what she had imagined before the workshop.

Another manager, Xavier, was head of the secretary at a university. His problem was how to work efficiently between a dean with many ideas and visions for the university but little understanding of the practical challenges on the one hand and a group of researchers with their own ideas and visions, and contractually secured rights to freedom of research, on the other. Xavier initially described this situation as a case of "herding cats". The sensory template embedded in this image is one of trying to bring together a large number of independently moving objects, in this case cats. Xavier was adept at speaking in metaphors and created many colorful and wonderful images. During the workshop, he drew an image of the situation as trying to build a bridge. He drew the administrative staff as sweeping the part of the bridge that was already constructed, the dean as walking far ahead on the water, oblivious that he was off the bridge, and the researchers as engaged in their own projects elsewhere. This image is different from the image of hearding cats, but it embodies the same sensory template of trying to bring together a large number of uncoordinated and independently moving objects. Xavier felt that the pictures brought clarity, but he did not find new ways of handling the situation.

Xenos, a manager with 30 years of experience, had been head of an IT department with 11 employees for four and a half years. Xenos' problem was that he could not convince his boss that investing in new IT equipment would save the company a considerable amount of money in the long run—and secure them against impending severe breakdowns from pushing the current system beyond its capacity. Xenos saw the situation

as analogous to pushing an object that resisted being moved, and he did not change this sensory template and did not find any solutions. What is particularly interesting about Xenos' case is that during the research he got a new boss. However, in the final interview, Xenos began by saying: "Not much has changed. I'm now reporting to a new CEO. He is American. The other was from Singapore. It's the same, just in a different way". This case hints at the power sensory templates have to shape our experience. It is possible that they shape our perception of the situation even to the extent that we can replace the people without changing the fundamental way in which we feel the situation—in this case, the situation of pitching an IT investment proposal.

These three brief examples show that solutions are not produced when managers change the metaphor they use to speak about a problematic situation *without* changing the underlying sensory template they use to comprehend the situation.

4.4   New Sensory Templates Can Emerge from Aesthetic Elements Outside the Method

So far we have seen how changes in sensory templates can transform seemingly unsolvable situations into situations the manager has no problem dealing with. In the examples above, the managers found the new sensory templates by looking at their artistic production (photographs, drawings, and poems) and noticing what stood out as something interesting and novel to them. In short, they found new sensory templates through activities intended to bring about new sensory templates. However, in some cases, new sensory templates emerged from other aesthetic elements of the learning intervention not directly intended to have this effect. These cases show that managers can use elements of how they felt during any part of the learning intervention to later structure and comprehend their problematic situations.

This is important for managerial educators because it invites them to consider a broader range of the sensorimotor experiences the managers will

be exposed to during their learning intervention design: How participants are welcomed upon arrival, the interactions with the facilitator, interactions between participants, seating arrangements (auditory, circle of chairs, tables or no tables), the number and length of breaks in the program, whether or not to allow participants to leave early or arrive late, and so on are all possible sources of new sensory templates which can be used or missed by the managerial educator. In Chap. 2, we discussed how theories-in-use emerge automatically and unintentionally from experience through processes such as associative and social learning. Through associative learning, individuals will (automatically and unintentionally) come to associate whatever consistently occurs simultaneously in their experience. If, for example, every time a manager admits to something they believe to be embarrassing about their own behavior or their lack of ability to handle a situation they are met not with judgment (as they may expect) but with keen interest and a wish to understand the motivations and mechanisms involved in the manifestation of this behavior, over time the manager may come to associate his own (embarrassing) behavior with curiosity rather than judgment and he may adopt this attitude toward both himself and others. Through social learning, individuals (automatically and unintentionally) pick up various role models' attitudes and mannerisms. When a facilitator operates from a particular sensory template, his interactions with others will embody this sensory template—allowing others to pick it up from the interaction. Thus, paying sustained attention to sensorimotor experience, the playful exploration of juxtaposing the problematic situation and various sensorimotor experiences, engaging in safe, open, and undefended dialogue, or simply being with others in a relaxed state may all be (unusual) kinds of activities which embody sensory templates the participating managers can adopt. In short, managers can sometimes learn more from partaking in the general "vibe" of the learning intervention than from the concrete methods used. And educators need to be aware of and use this as a means of teaching.

The following cases show how aesthetic elements of the learning context beyond those provided by the concrete method can become the source of new sensory templates which transform seemingly unsolvable situations into manageable situations.

4.4.1   Case: I'm a Drawing, My Colleague Is a Poem

Frank's story illustrates yet another example of a common problem known to many managers working in a silo-based organization. It is the dilemma between being hard or even manipulative when working to secure one's own project goals, and being flexible, taking care of coordination, collaboration, and the larger organizational goals—and risking being taken advantage of.

Frank was a team leader in a large multinational organization. Frank was leading projects with between two and fifteen employees. He had a background as a geophysicist and had always been working in technical roles up until four years ago, where he got his current formal management position. Even though he had more than 20 years of experience as a project leader, he felt he needed more formal management education, tools, and experience in dealing adequately with the staff responsibility of his current management position.

Frank worked in a silo-based organization. He tried to coordinate well with managers who were in charge of projects which were related to his own projects. Frank felt that the project managers in the organization, including himself, were constantly in situations where they had to choose between reaching their own project goals and sticking to the agreements they had made with other departments to secure the larger organizational goals. When pressured in this way, his colleagues usually prioritized their own projects. Thus, Frank often found himself in situations where the agreements he had made with another project manager were broken—causing problems for his project. For example, for each project, Frank would make agreements about borrowing employees from other departments a certain number of hours a week. But whenever one of these departments got an important project themselves, someone higher in the hierarchy would cancel such agreements, leaving Frank with fewer resources, in terms of staff hours, for his projects. Similarly, several project teams would often have shared access to a team of analysts. This would often lead to power struggles where the different teams tried to gain control over budgets and decisions about how to analyze the data and who to hire to do the analysis. When the teams were under time pressure, project managers could, for example, ask the analysts to prioritize

producing the data they needed for their own projects without coordinating with Frank's team. As a result, Frank's team had to wait longer to get the data *they* needed—delaying their work.

In such situations, Frank would, on the one hand, try to be flexible and find alternative solutions to reach his project goals with fewer resources. However, he often felt taken advantage of. On the one hand, he thought he might need to be more confrontational and insist on sticking to the agreements. On the other hand, he did not like this way of treating others and was not convinced that being firm and rigid was the best solution to these situations.

Frank's language showed that a central sensory template he used to understand the situation was that of seeing himself and others as having to choose between being flexible and being hard and rigid. This sensory template did not offer him a satisfactory solution to the situation, since being flexible led to being taken advantage of and being hard and rigid led to lack of coordination and poorer overall organizational performance.

No new sensory templates emerged in the specific art objects Frank created during the workshop. Yet, when he came back after a month, he told a remarkable story of personal change. He had begun to speak much more openly with his colleagues, instead of trying to deduce their motives. In particular, he would voice his perceptions and ideas more directly and had found that if what he said was reasonably well reflected, others would, to his surprise, be very ready to give him space and follow his suggestions.

During the last interview, Frank told a story about a recent situation where an agreement had been broken, causing problems for his project. Frank had not acted in any of the ways he was used to acting. He had neither chosen to be flexible and try to find a way to work with fewer resources, nor tried to achieve his own ends by becoming hard, rigid, and manipulating. Instead, he had walked down to the other project manager's office and told him what consequences breaking of the agreement had for Frank's team. He then said that personally he did not find it fair that the other manager had broken the agreement, but that he was interested in hearing what the situation looked like from the point of view of the other manager. He had been *sincerely interested* in hearing the

other manager's view. Much to Frank's surprise, the other manager simply said that Frank was right and changed things back to the original agreement. Frank had been delighted and astonished at how simple this had been.

Frank described the impact of the workshop on his personality and way of working in the following way:

I feel that it has an effect on me personally, because it has opened me up both for something functional, about how one can work with difficult things and for the insight that it is important to put oneself in the other person's place, and it's important not just to stop there, but to take the extra step and instead of thinking that they do like this because this or that, then one can just go directly to the source and ask! And then let people tell things from their reality and understanding. And that may be a kind of coaching, where one says that I experience that we have a problem with this… And I have actually done this previously, but maybe in a very square way, like: 'we have a problem, and it looks like this, and we should do this and this and this.' But one can take the extra step and say: 'I experience that we have a problem. What do you think? How do you see it?' Then it becomes more a dialogue… so one does not make conclusions too early.

When I asked how he had gotten the idea to begin experimenting with engaging his colleagues in open dialogue, Frank said:

I think that for me it was that we did *so* many different things [poetry, photography, and drawing]. It was an epiphany: that one can do this, one can do this, but one can also do this and this. And for me, it is a kind of innovative process. One removes oneself completely from the daily work and journey to a new place to people one does not know, and then one looks at one thing from many different angles. It is very interesting.

Frank had come to see different people as analogous to different art-based media. During the workshop, he had experienced Susanne Langer's point that different art-based media can capture different aspects of reality. And he had begun using this experience as sensory template—seeing that different people can capture different aspects of reality. He would see himself like a drawing and his colleague like a poem, and since both media showed

something valuable about the situation, becoming informed through both media would give him a fuller understanding of the situation. Using this sensory template enabled Frank to be sincerely interested in hearing what the situation looked like from his colleague's point of view. Thus, he had found a third option beyond being either flexible or hard and manipulative. He could seek a fuller understanding through open dialogue with his colleagues—without giving up what he could see and without trying to influence or manipulate what they could see.

Although Frank did not explicitly confirm this, as a facilitator I had the impression that there was yet another cause of the change Frank experienced after the workshop. During the conversations I had with Frank at the workshop, it became clear to him that everybody in the organization, including himself, was terrified of losing the blame game (in Argyris and Schön's terms, they operated from model I). The expression Frank used literally translates as: Not being left sitting with the monkey. This expression is similar to the English phrase not being left holding the baby, but being left sitting with the monkey implies being put in a shameful position—in addition to being made responsible for something in an unfair way. During the workshop, Frank spoke openly about this taboo topic. I believe that both seeing this fear clearly and seeing how it is an unconscious motivation for much of the behavior in the organization and talking about it in a relaxed matter of fact way, without any sense of taboo around it, freed Frank from being under its control. I believe that changing from seeing the fear of being left sitting with the monkey as a taboo to seeing it as a natural and shared human fear made it possible for Frank to engage in open dialogue. As long as he felt he had to tip-toe around the topic of the monkey, open dialogue would be very hard and scary, since this topic could come up at any moment during such dialogue. Being relaxed about this topic, Frank no longer had to be careful in his conversations. If the topic should come up it would be no big deal—it would just be stating the obvious. In short, he changed from seeing the topic as something to avoid to seeing it as something he could be relaxed about.

Interestingly enough, in the final interview, Frank said that he had become more interested in verbal communication, whereas earlier he had preferred e-mail communication. He had also begun to communicate with a larger group of people, including technical employees and

management on his own level and two levels up. And these people had told him that he came across as more competent and self-assured. He also experienced that people were more interested in hearing his opinion. This increase in confidence and interest in verbal communication might well be a consequence of having the taboo around the proverbial monkey removed.

What's interesting about this case is that the new sensory template of using multiple media/senses in understanding a problem, and of seeing the fear of being left sitting with the monkey as something he could be relaxed about, came from the experience of the broader learning context—not from any single art object Frank produced. This illustrates that aesthetic elements of the learning context beyond those the method provides can be the source of new sensory templates.

4.4.2   Case: Communication as Conduit for Information and Appreciation

Gary's story represents another classical managerial problem: having an employee who does not meet deadlines, but who possesses skills or knowledge which makes it difficult to replace him. In Gary's case, the employee in question was a unique programming genius who could solve coding problems nobody else could solve, but who partly due to a mental illness was unreliable. Replacing him would be expensive, because very few would have his skill level and because it would take a long time for someone new to pick up on concepts the organization worked with.

Gary was one of the participants in the control group where no art-based method was used. Gary was only interviewed about his situation. The interview included a systematic comparison of the interests of the various stakeholders. Gary was one of the very few people in this group who experienced a shift in the sensory templates through which he comprehended his problem. This shift led to a significant personal development and a solution to Gary's problematic situation. Like in Frank's case, this shift arose from experiencing the particular quality of the conversation he had with the facilitator and the other participants.

Gary was manager and one of three owners of a software development company. He was leading the department which developed new software and had some responsibilities relating to operations. The organization had 25 employees and a fairly flat structure. Gary had worked 27 years with project management, and for the last ten years since he was promoted to partner in the organization he had also had employee responsibility. Gary had never received any formal leadership education. He showed a high level of self-awareness around his reluctance to deal with the part of his leadership role involving employee responsibility.

> I am reluctant to deal with this leadership thing. I come up with all sorts of excuses not to take this role of responsibility. One of them is that the employees are intelligent people and I don't want to work with people who cannot lead themselves. And I know that is rubbish. But I *am* reluctant to deal with the responsibility, which actually is mine. And this I would, of course, like to work with.

This general problem was particularly visible in relation to one of Gary's employees. This employee was a unique asset for the organization because he could make code no one else could make. He was a programming genius. However, he also had some severe personal problems. According to Gary, programmers generally have personalities which make them challenging to manage. They are generally not particularly good at communicating with their surroundings and are very personally invested in their work. They never really stop working on the problems and they often take critique of their work personally. Gary understood these character traits well, and he had a knack for working with programmers on their own terms. But for this particular employee, these traits were on the verge of mental illness, and Gary did not know how to manage him and make him do what he needed to do to finish his projects.

When other programmers got behind on their work, Gary could tell them: "Get this done or else…". But because nobody could replace the problematic employee, Gary could not use an "or else!" with him. He simply had to wait until this employee got the job done on his own. For one project this had, so far, meant 1.5 years delay.

One of the reasons the employee would not deliver the code he needed to deliver was that he easily got sidetracked and did not know how to prioritize his tasks. He would find some particular challenge which caught his interest and spend all his time on this, without any concern for whether or not this was necessary in order to deliver what had been promised to the customer on time. Sometimes he would hear other programmers in the organization speak about a problem they were working on and if he found that more interesting than his own assignment, he would start working on this problem instead. Because he was not socially adept, he often worked from home. Sometimes Gary would not see him for a week, and he would not know whether he was deep in his work or deep in trouble regarding his mental health. The organization had hired a relaxation therapist who was having conversations with the employee of a more therapeutic nature. Gary was reluctant to address the illness with the employee himself for two reasons. First, Gary had no competency to work with mental illness. Therefore, he would let the therapist deal with the illness side and stick to the professional side himself. So whenever the employee did not show up for work, Gary would only call him if he had something work related to ask him. Second, Gary was afraid that if he called the employee too often, the employee would get tired of him and perceive him as a micromanaging boss—just like the other programmers would.

The situation was very frustrating for Gary and had led him to consider whether he was really cut out to be a manager with employee responsibilities. He felt he was not a good leader for two reasons. First, whereas Gary was comfortable about leading in terms of setting a course professionally as he had done working as a project manager, he did not like the leader role when more personal aspects were added. Second, he saw leaders as people with big personalities who take up a lot of space, and he didn't want to be like that. He didn't find his own person that important.

During the workshop, two things happened which retrospectively seemed to have had a big impact on Gary. First, one of the other participants, who had had experience with employees with tendencies toward depression and drinking problems, shared that such employees, to her initial surprise, were often grateful to her for calling them when they

were sick to check up on them. The employees themselves had told her to do so because this would help them to get out of their low mood. Often when they did not show up for work and she called to check on them, they would thank her and come to work. Second, several of the other participants challenged Gary's belief about being a bad leader. They found that he had a tremendous capacity to understand and care for his employees, and as such had some very important leadership qualities. They saw his style as "leading from behind" or "service leadership", rather than leading through a charismatic personality. Thus, during the workshop, Gary experienced firsthand how a conversation could be a means for acknowledgment and appreciation. In a later part of the interview, Gary was talking about what motivated different stakeholders. Gary remembered that whenever the employee in question had solved a particularly difficult problem, he would show it to everyone in the organization. This made him realize that what motivated this employee was acknowledgment and appreciation. These experiences changed how Gary comprehended "communication", and this helped bring about a solution to his problem.

When Gary returned one month after the first interview, he had sat up a group with just himself and the employee, with regular meetings every second week where the employee could tell Gary what he was working on and Gary could tell the employee a bit about what his world of relating to customers looked like. He had also told the employee that he would like him to be at the workplace two days a week and that even though he felt he got more done when working at home, it was important for Gary to have the employee at the workplace so they had the possibility of working together on the projects. He had said this without any "or else!" but just simply speaking human to human and being open about what he would like from the employee. He had also talked more openly with the employee about his illness instead of shying away from it. This worked. The employee was now working on what he needed to work on. The day before I met Gary for the last interview, the employee had delivered something that Gary had not expected to be finished for at least another month. Once during the meetings, the employee had told Gary about a problem he could not

solve and Gary had told him that actually he didn't really need to solve this problem now because this functionality was not important in relation to the upcoming test of the program with the customer. The employee had been relieved and had begun working on the things Gary wanted him to prioritize.

These changes may seem very simple. Gary said that what had inspired him to make these changes was the realization that the employee was primarily motivated by acknowledgment and appreciation and the realization that communication could be used not only to pass on information about what needed to be done but also to create a sense of connectedness and to show appreciation. This last realization came from experiencing the effect the conversation with the other research participants had had on himself. Gary said:

> It is not because you [the facilitator] have been teaching really. You have just used some simple things, and I think that is extremely interesting. I have become aware that it is important to talk things through, not just let them be. *I feel privileged to be allowed to be part of this.*

In this case, it is difficult to describe the change in terms of a change in sensory templates because these were not made explicit in the process of the interview. However, it is clear that Gary changed the way he felt "communication" and "motivation". In the first interview, he saw "communication" as a means of passing on information and as something that could potentially be invasive, and he saw "motivation" as something springing from the employees' professional interest in their work and from getting paid for doing the work. In the second interview, he saw "communication" as a means of generating a sense of connection and showing appreciation and "motivation" as something that can come from feeling appreciated and from simply meeting. In particular, the feel of the two ways of perceiving motivation is very different, and thus it seems likely that if the sensory templates were made explicit, they would be quite different.

The changes in Gary's way of comprehending "communication" and "motivation" came from personally experiencing the quality of communication

during the interviews and not from the creation of any art objects—since Gary was part of the control group, where no art objects were created. This case illustrates how aesthetic elements of the learning context can become the source of new sensory templates.

4.4.3   The Role of the Learning Context

The two cases of Frank and Gary illustrate that new sensory templates can emerge from aesthetic elements of the broader learning context and not only from the poetry, drawings, and photographs which were intended to bring about such new sensory templates.

Frank presented a situation he felt was a dilemma between being hard and somewhat manipulative and being flexible and focused on coordination, collaboration, and the overall organizational goals while risking being taken advantage of. This view seemed to be based on a sensory template where Frank saw his relationship with his colleagues as analogous to physically pushing or being pushed. During the learning intervention, Frank experienced how his poem, drawings, and photographs captured different aspects of his situation, just like different senses capture different aspects of an experienced phenomenon. They would be like pieces of a puzzle which are all needed to give the full picture. He later used this aspect of the learning experience as sensory template through which he could understand his relationship with his colleagues. Using this new sensory template, he came to view a meeting with a colleague as a matter of openly sharing points of view, with the aim of mutually enriching each other's understanding, rather than a matter of imposing one's view on the other. To Frank's surprise, this proved to be a more efficient way of changing the kind of behavior in his colleagues which made it difficult for him to reach his own project goals than his previous strategy of becoming hard and manipulative.

Gary presented a situation where a highly skilled employee was both irreplaceable and unreliable. Sometimes this employee would solve problems with amazing speed, and sometimes he would spend all his time working on problems which were not important for the organization's project goals. When Gary came he lamented that since he could not

replace the employee, he could not use threats to push him to do what was needed—he had no "…or else!" Gary was used to working with highly skilled and self-motivated employees who preferred to be left alone, and therefore he perceived "conversations with the boss" purely as a means of passing on information about job tasks and as something that was potentially imposing and invasive. Thus, he kept such communication to a minimum. However, during the interviews Gary realized that his employee was motivated primarily by feeling appreciated, and at the same time he experienced firsthand how "conversation" could create a sense of connection and appreciation. Thus, Gary changed his view of "conversation" from seeing it as imposing and invasive to seeing it as nourishing (i.e., providing connection and appreciation). This gave Gary the idea of setting up regular meetings with the employee where he could simultaneously focus the employee on the tasks most important for the organization and motivate him by offering him a space of connection and appreciation.

In Chap. 2, we discussed how theories-in-use emerge automatically and unintentionally from experience through processes such as associative and socio-cognitive learning. The above cases illustrate what this may look like in practice and how this can make aspects of the learning environment peripheral to the learning intervention the most important elements in the process of constructing new understanding and skills related to dealing with problematic situations.

4.5   Letting Go of Non-essential Aspects of Sensory Templates

As mentioned, the participants in the research were divided into three groups. One group worked with metaphors as described above. A second group of managers in the research was asked to leave aside any considerations of how to solve their problem and instead focus on creating photos, drawings, and poems which evoked in them the same sensorimotor experience as thinking and speaking about the problematic situation. In effect, this process revealed the sensory templates the managers used to

represent the situation. This process was more efficient in bringing about shifts in sensory templates as described in the above cases and it was able to create a different kind of shift from using a particular sensory template to using only the essential aspect of this sensory template—decoupled from non-essential aspects.

As a warm-up exercise, the participating managers in this second group were asked to describe the sensorimotor experiences triggered in them by different pieces of music, paintings, and words in both a language they did not understand (Russian was used) and a language they did understand (English and Danish were used). The participants were encouraged to use the faculty of inner sensing to notice the felt sense of their inner atmosphere. The managers would thus describe the opening of Felix Mendelssohn's *Violin Concerto in E Minor* (OP. 64) by using sensorimotor words such as floating, soaring, viscous, swaying, and dense. Similarly, they would describe the first track on R. Carlos Nakai's *Canyon Trilogy* as still, open, spacious, and very stable or grounded. They'd describe Pierre-Auguste Renoir's painting *La Yole* as evoking a sense of lightness, light warmth, and a gentle upward stream of energy. They would describe the word "bubblegum" as moving like a babbling brook, dark blue in color, somewhat weighty, and slow, whereas the word "trick" would be described as sharp, fast, and moving with sharp changes of direction. If they used abstract words, such as "sad", "interesting", "peculiar", or "unpleasant", to describe the state evoked in them by the music, painting, and words, I would ask them to notice what internal sensorimotor experience these abstract words referred to. For example, if they described a piece of music as "sad", I would ask them to describe what it was they sensed that led them to use the word "sad". They could for example answer: It feels like a gray substance slowly moving downwards through my chest, or it feels as if my upper back and arms were frozen and are now melting. Similarly, if they described the sense evoked by a picture as "unpleasant", I would ask them what "unpleasant" felt like in their body. They might answer that it felt like nausea or like needles or something other. I would keep encouraging them to explore the inner felt sense until they could describe it through neutral and concrete sensorimotor words. After a while, the managers got the hang of this and could do it on their own. Once the managers had some skill in describing their experience

in terms of neutral and concrete sensorimotor words, they were asked to describe the problematic situation in this particular way. Once they had described the inner atmosphere that the problematic situation triggered in them using sensorimotor vocabulary, they went on to describe this inner atmosphere further by using the media of poetry, photography, and drawings. Using such media often helped the managers capture more aspects of the sensorimotor experience triggered in them by thinking and speaking about the problematic situation. This process captured in verbal and non-verbal descriptions the sensory templates the managers used to represent the problematic situation and showed how these would often be composed of many distinct sensorimotor aspects.

This second intervention was more efficient in facilitating the shift of sensory templates described in the cases above. Changes in sensory templates simply occurred more often among managers in this second group than among managers in the first group. This can be understood by contemplating the difference between the process of describing the situation through a new metaphor and describing the situation through sensorimotor words. In both cases, the managers are describing the problematic situation through metaphors, but whereas in the first group the source domain could be anything, in the second group the source domain was restricted to sensorimotor experiences. As discussed above, participants in the first group could change their metaphor without changing the sensory template, since it is possible to create many metaphors containing the same basic sensorimotor experience. For example, the experiences of push starting a car, pushing a donkey, and pushing a boulder up a hill all contain the same basic sensorimotor experience of pushing. However, when restricting the source domain to sensorimotor experiences, a shift of metaphor will inevitably also be a shift of the sensory template. Moreover, when managers explored the sensorimotor experiences triggered by thinking about the situation, they often found that they had more than one sensory template available which they could use to comprehend the situation. However, they would generally rely more heavily on one dominant sensory template. So changing from using one sensory template does not have to be a matter of finding a completely new sensory template. Instead, it can be a matter of shifting which sensory template is dominant. Given these considerations, it is not surprising that restricting managers to

working directly with sensorimotor descriptions increased the likelihood that the managers would find alternatives to the sensorimotor states they usually used to comprehend the situation—thus increasing the efficiency of the intervention.

Moreover, the second intervention could also facilitate a different kind of shift in sensory template. This kind of shift can best be described as letting go of non-essential aspects of the sensory template used. When describing the inner sensorimotor states triggered in them when thinking of the problematic situation, the managers often discovered how the sensory template they currently used to comprehend the situation was composed of several sensorimotor parts. Even though these parts were tightly associated, it was possible to clearly distinguish them from each other. This created the possibility of shifting from using the composite sensory template as a basis for comprehending the situation to using one single core component of the sensory template to comprehend the situation. In other words, instead of shifting from one sensory template to another as in the previous cases, in these cases the managers shifted from using one sensory template to using only a specific part of that sensory template. For example, when managers describe the inner state they feel when thinking and speaking about an unsolvable problem they may state that they feel frustrated and angry. When asked to describe this state of frustration and anger using sensorimotor words, managers would generally describe their inner state as explosive, like hot liquid in a pressure cooker. This description matches Joseph Grady's work on primary metaphors (Grady 1997). However, this description consists of two clearly distinguishable sensorimotor states: the hot, expansive liquid and the container which restricts the expansion and flow of this liquid. When managers changed from using the combined sensation of heat and restriction to using just the sensation of heat on its own as sensory template for understanding the situation, it transformed their experience and enabled them to imagine new ways of engaging with the situation. When they removed the restriction aspect of the sensory template, what they previously experienced as negative frustration and anger began to appear as positive and relaxed assertiveness, directness, a sense of taking leadership, clarity, and even an adventurous excitement. Similarly, they changed from perceiving the situation as something causing frustration and anger to an

enjoyable challenge they could imagine many ways of engaging with. Similar processes could be observed in relation to composite sensory templates where the core sensorimotor state could be described as solidity or lightness instead of heat. When these sensations were used on their own instead of in combination with other sensations as sensory templates, the problematic situation changed from being perceived as unsolvable to being perceived as simple. That such transformations are possible indicates that there is something problematic about assuming a simple *causal* relationship between a situation and the anger (or any other emotion or feeling) felt by a manager in this situation. I will deal more in depth with this in Chap. 7.

The following examples illustrate how managers could find efficient ways of dealing with their problematic situations, not by changing the sensory template they used to understand the situation altogether, but rather by learning to perceive the individual aspects of the sensory templates they were already using and changing from using the composite sensory template to just a single part of this template.

4.5.1   Case: Being an Appropriate, Conflict Seeking, Disloyal, Weak, and Uncontrolled Leader

Helena was a head nurse at a hospital with 35 employees reporting to her. She had been four years in the position, and it was her first position as manager with employee responsibility. Helena's problem was that the nurses exclusively used their professional *medical* knowledge to evaluate their own work. But due to limited resources, what is *technically* possible to do for patients is not always *practically* possible to do. Whenever the limited resources forced the nurses to choose suboptimal treatments, they felt they were doing a poor job. Furthermore, the nurses were also charged with tasks not directly related to nursing, and while dealing with such tasks they felt time was taken away from doing what really matters to them: taking care of patients. Helena found it very difficult to explain to the nurses that they were in fact doing a great job, even if they could do more had they had the resources. The situation was frustrating not only for the nurses but also for Helena. However, Helena felt that expressing her own frustration or anger was inappropriate for a leader who was supposed to keep up morale—and she therefore repressed it.

During the workshop, she described how this situation felt to her through pictures, a drawing, and a poem. She took a picture of a glass window with the word "escape route" (Fig. 4.2). She took the picture because of the word and because the scene spoke to her. Looking at it afterward, she noticed why she liked the picture. On the other side of the glass, there were a parking lot and gray concrete buildings. Commenting humorously on the picture, she said:

> When one needs an escape route, it is because one is running from something bad. But I don't think it looks much better on the other side of the screen.

In her drawing, she tried to make something with no softness, which could not stay within a frame. In this drawing we see the classical description of anger as something expansive plus something trying to hold this expansion in (Fig. 4.3).

Helena's poem was called "Frustration".

> The situation creates exasperation. The result is disinclination.
> Everyone expresses fury. The top keeps us in a hurry. We end up sorry.
> The employees are anxious. The conditions are tough. The tasks are too many and too much.
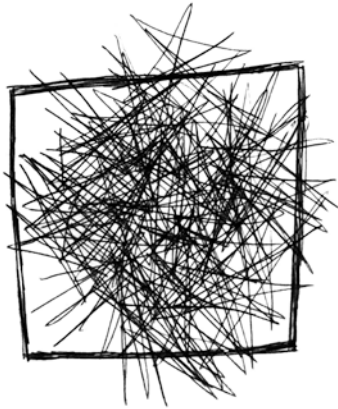

Fig. 4.2 Helena's picture of "escape route"

Fig. 4.3 Helena's drawing

> It is really uphill. It's all shit to put it in brief.
> The conflict mortifies. The demands come like cries. The patients are seen as wry
> (Situationen skaber utilfredshed. Resultatet bliver utilpashed.
> Alle udtrykker vrede. Oppefra bliver de ved at træde. Vi ender med at græde.
> Personalet de er bange. Vilkårene er trange. Opgaverne er for lange og mange.
> Det er rigtig hårdt. Det hele er noget lort hvis det skal siges kort.
> Konflikten den er svær. Kravene kommer som bræer. Patienten opleves som tvær)

Immediately after writing this poem, Helena began laughing and expressed that she felt both great relief and greatly energized. Creating these works of art, in particular the poem, allowed Helena to experience the energy in her frustration decoupled from the restriction. This sensorimotor experience of freely flowing energy became her new sensory template she used to understand and engage with the situation.

When she returned after one month for her final interview, she described how after having allowed herself to express her frustration and anger freely and without any restricting "political correctness", she had begun to feel herself more clearly, instead of using all her attention on trying to figure

out what others were feeling and what they expected of her. This increased awareness of herself was visible in her language. When Helena, before the workshop, was asked to describe the problematic situation in brief, she used nine sentences and did not use the word "I" in any of them. When she was asked to do the same one month after the workshop, she used ten sentences and used the word "I" in five of them. The increased awareness of herself relaxed the pressure she put on herself to perform in the way others expected her to. In the final interview, she related how she had been to a dinner with her boss and management colleagues and when they asked her what she had done in the workshop, she had pulled out the poem and read it—which is something she would never have done before the workshop. Everyone had laughed and thought the poem was a spot on description of the situation. She felt the reading produced relief in the whole group.

In relation to her work, she no longer felt she had an unsolvable problem. She was now working on highlighting the patients' expectations and showing her nurses how they often met those expectations, and she felt confident that this was the right way to proceed. The conflict between resources and the possibilities of modern medicine was still the same. The nurses still found this frustrating. But Helena no longer had any problem dealing with this situation. Before the workshop she had felt paralyzed. This paralysis had now vanished. This suggests that the paralysis Helena had felt was not caused by the situation, but was a sensorimotor state she activated as part of her act of comprehending the situation—namely the restrictive part of the sensory template she used to understand her role as leader.

This case illustrates how changing from using a composite sensory template consisting of energy and restriction to using only one part of the sensory template, namely the energy, changed the situation from seeming unsolvable to being a manageable situation.

4.5.2   Case: Being a Likable Leader

Ira was the owner and daily leader of a dance school. Ira's problem was that some of her employees had personal agendas which impaired their ability to collaborate on the tasks she gave them. She had for many years tried to change the attitude of these employees, without any luck. During

the initial interview, she said that she knew other leaders, personally, who would be able to deal with this kind of employee, but she just couldn't do it, and she was unsure why. Ira had six years of experience as a leader, and she was currently responsible for 18 employees. Most of the employees were teachers; the rest were admin and cleaning staff. The problematic employees were found among the teachers.

Ira described two types of problematic employees, which will be familiar to most managers. The first type of employees Ira called "the divas". The divas were primarily concerned with being the stars of the organization. They wanted to be the top name on the posters and the main acts at shows and festivals. The other type of employees Ira called "the wage slaves". The wage slaves were primarily concerned with their contractual rights and with counting minutes and discussing exactly how much they would be paid for each single task they performed. As such, Ira didn't find there was anything wrong with either the wish to be the star and perform or with wanting to get a fair wage. The reason she saw both of these types of employees as problematic was that they were so occupied with these agendas that it impaired their ability to collaborate on doing what was needed for the organization to thrive.

The disruptive effect of employees' excessive focus on their personal agendas was particularly visible during staff meetings. Ira would often experience that the discussion was derailed during these meetings and that important points on the meeting agenda were left unaddressed. She felt unable to secure the necessary level of productive dialogue during these meetings. When this happened Ira got angry. However, she saw this anger as problematic and would hide it. She saw it as the opposite of being open, inclusive, listening, rational, reasonable, and in particular being likable.

During the workshop, she explored the sensorimotor experiences she felt when thinking and speaking about this situation. Through this work she discovered three distinct components, each one being a reaction to the previous:

1. Something explosive, sharp, and clear. She called this aggression.
2. Something flickering, diffuse, and unclear. She called this confusion.
3. A screen in front of her/a stiff expressionless face. She called this disconnection.

The flickering and unclear sensation was expressed in pictures of transparent metal stairs and reflections of windows in other windows. It was also expressed in her drawing as a cloud of curved and tangled lines. The explosive sensation was expressed in the drawing as sharp, jagged lines giving the impression of sharp teeth. These were placed under the cloud of curved and tangled lines. The screen and the stiff expressionless face are shown in the drawing as a small square and behind it a small ladybird. As Ira humorously explained: Ladybirds are not known for vivid facial expressions (Figs. 4.4, 4.5, 4.6, and 4.7).

The three components of the sensorimotor experience were also expressed in the poem: the flickering and unclear in the two first lines, the explosive in the two following lines, and the screen and the expressionless face in the two last.

> "Thoughts like confetti, arms like soft spaghetti
> Complaint-arguments flickers, unmanageable dangers, indisputable.
> Strife that makes me explosive. The jaw is tight and aggressive.
> Should I let them make noise? Ego up pillars, down frames*.
> Shoots the screen in between them and me. The face turns to stone.
> The mass stiffens. Unimpressionable. The world woolly, unreal".

Fig. 4.4 Ira's picture of reflections in windows. *"Some windows reflecting something. Are you looking in or at the reflections or the window itself?"*

Fig. 4.5 Ira's picture of hallway. *"Thing overlap. There are many ways to go and many decisions… but I cannot see where I get to if I choose one or the other way"*

Fig. 4.6 Ira's picture of metal staircase. *"It's a staircase that is both transparent and a bit flickering, 'cause one can see other steps through the steps. And one has to look for a while to see if the steps go up or down. So it's a bit confusing and unmanageable"*

Fig. 4.7 Ira's drawing. *"There is some aggression in the middle and some confusion over here and my usual solution over here…. To put up a screen… and stay expressionless on the other side of the screen"*

*This is a variation of a Danish idiom, which literally translates as "talking up pillars and down walls". It refers to talking a lot and uninterrupted without it leading to anything.

Seeing that the situation consisted of these three separate sensorimotor aspects changed Ira's way of perceiving the problematic meetings and consequently how she could imagine leading these meetings.

When Ira looked at her pictures, poem, and drawing, she immediately became curious about how much she used flickering and confusion to cover over and hide aggression. Seeing this was new to her.

I have not thought about it in this way before. I have more thought that I should be rational, thoughtful, understanding, tolerant, flexible, and mmm [sarcastic sound]. So, therefore, I have not expressed the aggressive side. And I don't think I have been aware of how much I use the other thing to simply distract myself from it.

Ira noticed that labeling the inner state of sharpness as "aggression" associated it with being not nice or not likable and thus made it appear as something she should avoid or control. Her way of avoiding it was first by creating confusion and second by becoming rigid and disconnected. Instead of clearly saying what she meant, she would withdraw and reflect and later present her reflections in an abstract way. This was, as she put it, a way of "…hiding myself behind a little piece of theory". By representing the inner state of sharpness through the visual shapes, instead of through the negatively laden word "aggression", she was able to feel it decoupled from the other sensorimotor states it was usually connected to. When she felt the state on its own in this way, she realized that this inner state was also what she at other times would call "clarity" or "strength". She realized that nobody was benefitting from her attempts at being nice by hiding that she knew exactly how she wanted things to be.

Already the day after the intervention she had another staff meeting. She decided to lead this meeting in a very different manner from what she was used to. She gave each point on the agenda a color code. At the start of the meeting, she explained to the participants that she expected them to get through all points on the agenda within one hour. Then she explained the color codes. Green meant that a point would be discussed in the group for a fixed length of time. Yellow meant that she wanted their opinion on the matter but that there would be no discussion. Red meant that they did not need to have an opinion because the point was simply a matter of passing on information to them. The meeting finished on time. All points were covered. Furthermore, Ira felt that the employees had been really happy with the meeting. In the final interview, Ira was very happy about her new style of leading meetings. She found that allowing herself not to be open to discussion on certain points did not make the employees regard her as less likable, but rather made them feel safe in knowing what they had to deal with.

This case illustrates how the sensorimotor state Ira used to represent the situation could be broken into several individual components: the sharpness and energy, the flickering confusion, the rigid screening off, and the overall tension related to judging the state as something negative (i.e., calling it aggression). Clearly seeing the individual components

allowed Ira to feel the sharp energy decoupled from the other sensorimotor states. This enabled her to shift from using the composite sensory template to using this particular aspect of the composite sensory template as means of understanding and engaging with the situation. The result was that the meetings transformed from an unsolvable problem to something Ira could easily manage.

Several of the managers in the research went through processes similar to those of Helena and Ira. Many managers labeled inner states of heat and energy as "aggression" and rejected it for various reasons. One manager associated aggression with something that creates rather than solves conflicts. Another saw aggression as a form of disloyalty toward her employees. Yet another saw aggression as a sign of weakness and of having lost control or being unable to handle things. Thus, for these managers "aggression" was a highly composite sensory template created around the core sensorimotor state of heat and energy. For all of these managers, learning to sense the core sensorimotor state of heat and energy without judging it as something bad enabled them to feel it in a relaxed way, rather than automatically tensing up in an effort to control it. Experiencing the heat and energy as something that could flow freely in them, rather than something that threatened to explode out of its confinement, transformed their experience of this state from something negative to a range of phenomena of immense value in their work as managers, such as clarity, strength, and courage. Other managers experienced similar processes where the core sensorimotor state could be described, not as heat or energy, but as lightness or solidity. I will explore these processes and how to facilitate them in more depth in Chap. 7.

4.6   The Trap of "More Clarity"

So far we have looked at the managers who worked with their problems using two different art-based methods. A third group of managers in the research did not use any art-based interventions. The managers in this group were merely interviewed about their problematic situation. The interviews included a stakeholder analysis. Looking at the managers in this group showed that managers can perceive an intervention (here the interviewing) as useful even if it is not.

Several managers in this group found the interview process very useful and reported at the end of the research that they had found "more clarity" around their problem. However, most of them (17 out of 20) did not find any solution to their problem. In these cases, *seeing the problem clearer* simply meant seeing the problem clearer from their current vantage point, that is, becoming more convinced about their particular way of seeing the situation and getting better at arguing why the situation was as they already perceived it to be. However, part of their view of the situation was that it was unsolvable. Thus, increased clarity in these cases only made the managers more convinced that the problem really was unsolvable and made them better at arguing why this was so.

When the managers thus felt they saw the situation with increased clarity, some of them reacted by simply giving up hope. As long as the problematic situation had not been entirely clear to them, they could sustain the hope that more clarity would reveal something that would show them how to solve the riddle. However, when the mist of uncertainty had dispersed, and they saw the unsolvable nature of the problem with clarity, it seemed that they would just have to accept the problem as an unavoidable fact of life.

Other managers reacted by concluding that the way they had tried to solve the problem so far was in fact right, and that they would just have to increase their current efforts. However, such conclusions do not seem to hold much merit, since at the beginning of the research the managers themselves had stated that the strategies they had used so far didn't bring them the results they wanted. Presumably, continuing doing something that had not worked thus far seemed a better option to these managers than having to conclude that the problem could never be solved. This reaction can be seen as an example of using rationalization to diminish cognitive dissonance (as discussed in Chap. 2).

In all of these cases, neither of the two processes described in previous sections occurred. There was no change in the sensory templates the manager used to understand the problematic situation. Thus, they kept looking at the problem from a vantage point from where no solutions were visible.

It is very important that even when managers did not find any solutions or any new ways of approaching their problem, they could still at the end of the intervention report that they felt the process had been valuable

to them and that they had gained increased clarity about their problem. This fact should make managerial educators skeptical about such reports. Of course, it is nice if a student or a client is pleased with their learning experience, but as educators we need to distinguish between different kinds of value our students or clients can perceive in their learning.

In the above examples, the value did not relate to learning something which made them better at *solving* an organizational issue. No solution was found. No new ideas for possible solutions were formulated either. The value the managers in these cases spoke about was the value of being confirmed in the correctness of their current view of the situation. And whereas the managers themselves may find value in being confirmed in their points of view, as educators we should not accept this as valuable when a manager's current view does not enable him to deal efficiently with situations which impede organizational performance.

4.7   Images of Problem-Solving

One interesting trend that can be seen in the cases from the research is that when managers encounter unsolvable problems, the real problem is not necessarily in the external circumstances. The real problem can be that the managers comprehend the situation as analogous to either moving or balancing physical objects and that these sensory templates do not support the managers in dealing efficiently with the given situation.

If managers understand organizational problems and problem-solving as analogous to the sensorimotor experience of moving something, they will organize their experience of the problematic situation into categories, such as the object that needs to be moved, the desired destination, means of moving the object, obstacles to moving the object, and means of removing these obstacles. This may sound very familiar and like a good rational approach to problem-solving, but it can in fact at times be very inefficient. When managers use this sensory template to structure their understanding of problems and problem-solving, it can easily lead to seeing other people, their attitudes and opinions, and even their values as analogous to objects that need to be moved or obstacles that need to be removed. This can lead to rationalizing various forms of violence as simply doing what needs to be done for the benefit of all stakeholders (or at

least all *important* stakeholders). When managers treat other people as objects to be moved or obstacles to be removed, they are likely to start dismissing legitimate objections by interpreting them as resistance based in these people's incompetence, laziness, egotism, or lack of understanding and organizational overview, and they will be less likely to see the shortcomings of their own understanding and to see their own part in the creation of the problem.

Above, we have seen a number of examples of this sensory template failing to bring solutions to problems. Anna initially saw her colleagues' attitude to management as an obstacle to be overcome. Yet, she could not do this. Becky initially saw the customer service employees' feeling of being underappreciated as an obstacle to be overcome. Yet, she could not do this. Catharine saw the rebelliousness of the managers in the business unit as an obstacle to be overcome. Yet, she could not do this. Dorothy started out believing that she had to overcome the obstacles to generating sales. But she was exhausted by the very thought of this work—and she even had difficulties in identifying what the obstacles were. Einar tried to identify the obstacles to his employees' contentment and failed—which led him to feel that the employees were hiding the truth about the obstacles from him. In all of these cases, the real problem was that the managers structured their understanding of the problem in terms of moving objects and removing obstacles to this movement and that this way of structuring their understanding did not help them act efficiently.

Similarly, if managers understand organizational problems and problem-solving as analogous to the sensorimotor experience of finding a balance point, they will organize their experience of the problematic situation into categories, such as two or more mutually exclusive elements, the pros and cons of each element, and the search for the optimal balance between these elements, that is, how much "pros" is necessary and how much "cons" is tolerable. This too may sound like a rational and reasonable approach but this can also be highly inefficient. It can be particularly inefficient when the disadvantages of one or both of the elements are unacceptable or when the advantages of one or both of the elements are indispensable. Sometimes, finding a balance point is like choosing between pest and cholera. Sometimes, trying to find a balance point leads to paralysis, lack of integrity, lack of coherence, and efficiency.

Above, we have seen a number of examples of this sensory template failing to bring solutions to problematic situations. Frank was initially trying to find a balance between being hard and being flexible. If he was too flexible, the others would take advantage of him, and if he was too hard, he didn't like himself, and the overall organizational performance could suffer. It was impossible for Frank to find a satisfactory balance. Gary struggled with finding a balance between being controlling and giving freedom to a certain employee. If he gave too much freedom, the employee might not work on the projects he needed to work on in order for the company to deliver what they had promised to the customers. If he was too controlling, he was afraid to come across as invasive and that the employee would react negatively to this. Searching for a balance between control and freedom did not help Frank deal with the problem. Ira was looking for a balance between being in control of her employees and being liked by her employees. If she made decisions herself, she was afraid the employees would not like her, but if she invited the employees to discuss too many things, the employees would engage in endless quibbling and no useful decisions would come of it. Again, thinking about the situation in terms of a balance between being liked and being controlling did not help Ira deal with the situation. In these cases, the real problem was that the managers structured their understanding of the problem in terms of balancing objects and that this way of structuring their understanding did not help them act efficiently.

It is important for managers to know that whenever they find themselves in a situation where they feel they have to move something forward or find a good balance between mutually exclusive elements, the reason they feel they have to move something or find a balance is that they themselves structure the situation in those terms. The feeling is not *caused* by the situation but comes from their own acts of comprehending the situation. The feeling of having to either move or balance something *is* the sensory template they use to understand the situation and to engage with the situation. These are sensorimotor states the managers themselves add to the situation in their effort to comprehend it. Therefore, if managers consistently fail in dealing with such situations, it is likely that the sensory templates of moving something or balancing something are simply poor tools for engaging with that particular situation and must be dropped—allowing alternative sensory templates to emerge.

References

Solomon, R. L. 1949. "An Extension of Control Group Design". *Psychological Bulletin* 46: 137–50.

Springborg, Claus. 2015. "Art-Based Methods in Management Education". Cranfield University.

Taylor, Steven S., and Donna Ladkin. 2009. "Understanding Arts-Based Methods in Managerial Development". *Academy of Management Learning & Education* 8 (1): 55–69.

Wicks, Patricia Gaya, and Ann Rippin. 2010. "Art as Experience: An Inquiry into Art and Leadership Using Dolls and Doll-Making". *Leadership* 6 (3): 259–78.