

### Part 1 What is Creative Thinking?

#### Our creative mind

Our mind often runs on routine, in fixed patterns. We think in our own familiar way and use logic that we have previously successfully applied. With this, we hardly give original thoughts a chance, we cannot solve some problems and we leave many possibilities unused.

#### What is Creative Thinking?

- Creative Thinking is the ability to find new and unusual but applicable ideas for existing issues. It is pattern-breaking, innovative and a smart way of thinking.
- You form ideas, insights and thoughts that do not emerge in your brain based on logic or the first impression.
- You go in search of the unusual, non-standard, unusual, not self-evident in your head. As a result, all kinds of new connections are created in your brain.
- This also increases your own possibilities: your thinking framework becomes broader, you increase your ability to solve complex problems and issues, you develop flexibility in thinking.

#### Why Creative Thinking?

In a world that is changing so fast, it is very important that you are flexible and can move with us. Creative Thinking is in the top 3 competencies that you as a human being should have or develop to be successful in the 21st century. It provides distinctiveness, innovative power and opportunity-oriented thinking and is the engine for ideas that allow you to change the world.



Walnut or brain?



### Part 2 Creative Thinking is playing

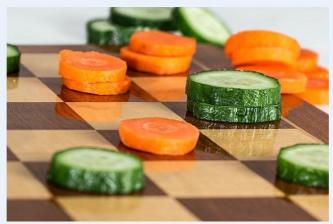
#### **Playing**

Our creative thinking is stimulated by playing. Playing is very important for people and a natural way of learning. Being involved in something without having to, but literally playing with it, not only provides satisfaction, but also more ideas. While playing, you are not consciously working on an assignment. This allows you to explore more sides of a subject. Creative Thinking is a form of playing. A lot of Creative Thinking techniques are actually game forms.

Because playing usually provides fun, most people also have a lot of fun using Creative Thinking techniques. Energy is created and it makes it fun to tackle and solve a difficult issue or problem.

#### **Creative Thinking and playing are part of Nexxdott**

Nexxdott's programs and products are very deliberately often cast in game form and the development of Creative Thinking runs like a thread through everything. We use Creative Thinking techniques at Nexxdott a lot.



Creative Thinking: playing with vegetables



### Part 3 Creative Thinking techniques

Creative Thinking can be stimulated with the help of Creative Thinking techniques. They make you look for the unusual, not obvious in your head. There are a lot of Creative Thinking techniques on the internet and in books. We have collected a number of well-known and lesser-known Creative Thinking techniques, explaining how to use them:

- The brainstorming technique
- Negative brainstorming
- Mind maps
- Superhero technology
- From dreaming (wishfull thinking) to daring and doing
- The ladder of abstraction
- Coming up with crazy ideas
- Image association
- Feel what you feel
- Language portrait
- Freely associate
- Freely associate with an image with a group
- Design Thinking
- Mix & Match

Some Creative Thinking techniques, such as mind maps, are already used by children at school. Others are widely used in companies, for example for designing a new product or solving a difficult problem, such as brainstorming or Design Thinking.



Brain or woman with head on her knees?



### Part 4 The brainstorming technique

Brainstorming is perhaps the best-known Creative Thinking technique for solving a problem. A brainstorm consists of two phases: the divergent phase (idea-collection phase) and the converging phase (idea evaluation phase). To increase the quality of ideas and solutions, you can go through both phases several times in a row.

You start with the divergent phase in which as many ideas as possible are devised to solve the problem. You will look for all possible solutions and thus create a large number of options. At this stage, mindsets go in all directions. This gets your brain out of fixed thinking patterns and directions. An important condition for generating as many ideas as possible is that ideas are not yet assessed. This is why it is inhibiting in coming up with new ideas.

Only when no one can come up with an idea will you go to the converging phase. In this phase, all ideas are looked at and discussed. Now you can ask questions to each other and judge ideas by usability. This way, good, useful ideas are filtered out to solve the problem.

#### **Brainstorming rules:**

- Formulate the brainstorming question as short and powerful as possible. Put it on a flip chart when you start brainstorming with a group.
- Quantity trumps quality. Collect as many ideas as possible, according to the principle of "Call it!". Any idea is allowed: crazy, original, serious, humorous.
- Write all the ideas on the flip chart, even the most idiotic and wild ideas.
- Postpone your judgment.
- Combine and build on each other's ideas.
- If no one has an idea anymore, look at and discuss the written ideas; which ones are useful for solving the problem?





### Part 5 Negative brainstorming

Many people can brainstorm negatively rather than positively. Negative brainstorming uses our tendency to see all kinds of obstacles when solving a problem, which ultimately does not solve the problem or puts it on hold. In negative brainstorming, you encourage people to come up with as many obstacles as possible to make the problem even bigger, torpedo it or sabotage it. I can assure you: very nice to do and extremely meaningful!

#### Here's how it goes:

- 1. Formulate the problem
- 2. Mirror the problem
- 3. Start thinking negatively and come up with solutions to the mirrored problem
- 4. Then start brainstorming positively again: turn the negative solutions into ideas for the original problem statement (at 1)

**Example:** A lot of truancy was made at a school. It failed to reduce the number of truants. A negative brainstorm was organized.

- Problem: It is not possible to reduce the number of truants.
- The problem was mirrored: How do we ensure as many truants as possible?
- Then, with negative thinking, the following solutions were devised for as many truants as possible:
  - o Make sure students get a lot of tests
  - o Create a bad atmosphere in the classroom, no order, cold, unsophisticated
  - o Take care of very long teaching days, and so on.
- After that, the negative solutions were turned into ideas for the original problem statement, such as:
  - o Maximum 2 tests per week
  - o Teachers who welcome students and create atmosphere
  - o Shorter lesson days and start later
  - o Conversations with truant students to find out the cause, and so on.



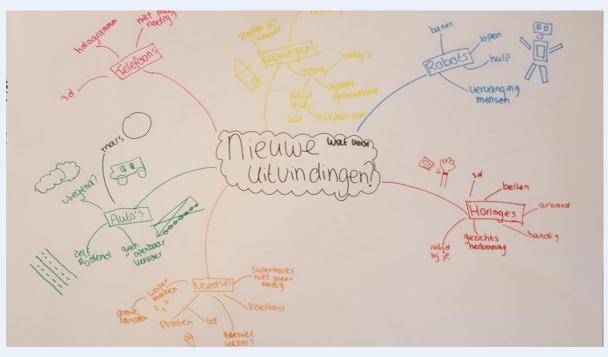
### Part 6 Mind maps

A mind map is a brainstorming technique with which you can visually structure ideas. It helps analyze a problem and remember information. It is a very effective way to get information in and out of your brain and a creative and logical means of taking notes that literally "map" your ideas.

- Place a (large) sheet of paper across and place a word or draw an image in the middle of your paper. By using one word or image, you clearly indicate what the theme of your mind map is, that's all it takes to start.
- Connect branches to your theme.
- Work as much as possible with small drawings or symbols in your mind map.
- Write all words in block letters. This makes them stand out better. Not only does this make you read the words faster, but it gives your brain clarity and overview.
- Line up every word you write down. This gives your mind map a ground structure and you keep it clear. In addition, it is important that each line is connected to one other line and that you draw the lines from thick to thin. Use thick lines at the center of your paper, indicating that it's a global topic. As you get more to the outside of your paper, you draw thinner lines, as the subject becomes more specific.
- Always use one word or image per line. Then you can easily add other words or images to your branch.
- Use different colors in your mind map, which allows you to indicate a clear overview between certain categories.
- Let your mind and imagination run wild, use your imagination, anything goes. A lot of thoughts and ideas can come to mind while creating a mind map. Put or draw them all in your mind map, because that stimulates your creativity.
- Work at a fast pace, don't think too long, but keep going!
- Later you can possibly carry out another restructuring.



#### **Examples of mind maps:**







### Part 7 Superhero Technique

Take in mind a hero or heroine for whom you have a lot of admiration in a positive or negative sense. It can be a living or former living person, but one with extraordinary qualities, for example a legendary sports hero, a political hero or a social figure who has done a lot of good. But it can also be a fairytale character, comic book hero or actor or a science fiction hero. At least take a hero you know enough about.

Now empathize with your hero. What does he look like, how does he move, how does he feel, what can he do? When you have your hero sharp on your retina, you wonder how he would react to the problem; How would he handle it? Translate your hero's solutions into concrete solutions to the problem.

- Formulate your problem in one sentence.
- Take a hero or heroine in mind.
- Make your hero or heroine alive. What qualities can you attribute to him/her?
- How would your hero handle the problem? What can you do with those ideas to solve the problem?

Instead of a hero, you can also take an animal that appeals to you and see how you could solve the problem with the specific characteristics of the animal.





## Part 8 From dreaming (wishfull thinking) to daring and doing

With this technique you wonder what you would very much like to achieve:

What is the most ideal solution to the problem?

Imagine that there is no impediment, in this situation everything is possible and nothing is impossible. What is your wish (dream)? Answer this question, without thinking about all the barriers and preconditions that could hang around the problem. If you have crystal clear what your dream is, go to the here and now. What steps do you need to take to achieve that dream? Start at

Step 1: "First I have to do this"...

Step 2 "If I have done that, then I can....", and so on.

Take small, logical steps that can be overlooked and for which you have the energy and courage. If you lack the courage, ask yourself: "What do I need to dare to take this step?".





#### Part 9 The Ladder of Abstraction

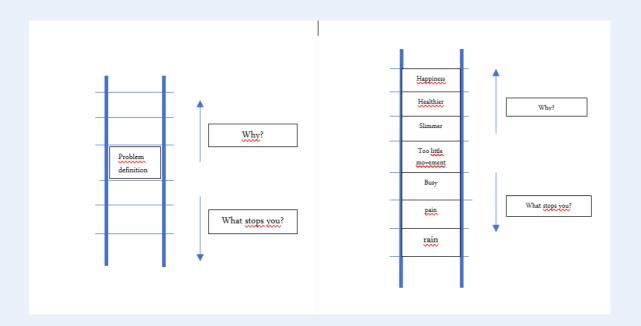
With the Ladder of Abstraction, you assume a preliminary problem.

You can climb the ladder by asking yourself questions like, "Why do I want to achieve this?," or "For what purpose do I want to achieve this?"

You can also descend on the ladder. You ask yourself the questions "What's holding me back?" How?"

By answering these questions you will come up with new problem definitions.

Example problem: "I don't move enough":



For example, new problem definitions include:

- How do I get slimmer (up on the ladder).
- How do I reduce the pain? (down on the ladder).



## Part 10 Coming up with crazy ideas, stimulate your imagination!

Use your imagination and come up with crazy ideas with weird combinations, such as:

- How does a carrot run?
- Where would I go on holiday if I could walk on water?
- What would it be like if I was an ant and went shopping at Albert Heijn?

Thinking about such crazy things and coming up with crazy unusual combinations can lead to ideas for solving an existing problem.

For example, if you get into the skin of an ant, you suddenly become very small and you go shopping from a completely different perspective, because you see everything differently. So you will notice different things than usual and you will also encounter very different challenges than usual.



If I was tiny, how could I feed a giraffe?



### Part 11 Image association

A picture says more than a thousand words. So try to think in images when generating ideas.

- Go to Google's image search and search for keywords related to your question or problem.
- Once the photos appear on your screen, write down what comes to mind first, or the first thing you notice in those photos.
- Then you start thinking about why those thoughts came to mind or why something in the photo caught your attention.
- Then you think about what you could do with that to solve the problem.

Based on those thoughts, you can come up with a lot of new ideas that have to do with your question or problem.

Problem: I need new shoes...















## Part 12 Feeling What You Feel

Put on a blindfold and let others give you an object all the time. You can tell me how you feel, but you can't tell me what it is, just what you feel.

For example, a shell: go-kartish, semicircular, hard, cold, hollow, small, feels good, etc.

Then go to a question or problem that bother you and do the same. Name what you feel about it, without analyzing or explaining the problem or question. Then discuss how these feelings affect the problem or question and what you could do with it to come to a solution.





#### Part 13 Language Portrait

Language portrait is a method to increase people's visual ability. That is important for creativity. With the help of your visual ability, you make different associations than usual. Very creative people often have a good visual ability.

With the Language Portrait method you describe as visual as possible an object from your memory that has impressed you. After a while you experience that your description is becoming more and more visual.



Tell in scents and colors



#### Part 14 Free association

When associating freely, you tell everything that comes to mind, where you relate different things in your mind. It often happens almost automatically: With the word "black", many people will automatically say "white". The most obvious associations always come first.

Unique, fresh associations always come later. It is therefore important that you are encouraged to continue. For example:

- Make associations with "tree" for a minute.
- Make an association with the word "mouse" for a minute, where all associations must be able to make sound.















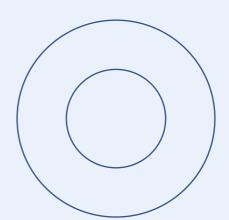


# Part 15 Freely associate with an image, with a group

Draw on a sheet of paper a simple shape, for example two circles, one large and one small, with the small one drawn in the large one. Ask anyone who participates in turns in the row or randomly call each other what it is.

#### For example:

- a wheel
- a doughnut
- an eye
- the letter O
- a hat from above
- a tapered tower from below
- two planets in a row
- an island in a pond
- a game pawn from above
- a round table on a round rug
- a tube
- and so on



Other shapes that you can draw, for example: a triangle, a wavy line, a circle with a stroke through it, and so on.

You become aware that you can look at something from different perspectives, and the longer you continue to associate, the more surprising the ideas become. A free association exercise can be a good warm-up for the real thing: freely associating with the problem or issue that needs to be solved.





### Part 16 Design Thinking

Design Thinking is widely used in companies and organizations, for example for designing a new product or service.

It is a method that is ideally suited for solving very complex problems, for example in your own life, in companies, in countries and the world (community or social problems). Man is central to the methodology by always defining problems based on human needs. These are the 5 phases of the Design Thinking methodology:

- Have empathy (empathy in the feelings of others)
- Define the problem
- Generate ideas
- Create a prototype
- Test the solution and process the feedback that comes from it.

At its core, Design Thinking is all about not getting stuck in talking for too long. Once you have formulated the issue, you start to collect as many ideas as possible, which can contribute even slightly to a solution. You prefer to do this by having as many stakeholders as possible (for example those involved in the problem) work together.





#### Part 17 Mix & Match

New ideas are often a combination of old ideas. Someone who is creative cannot mix obvious combinations into a new whole. Separate combinations have led to great successes in fashion, culinary atmosphere, architecture and technology. Just think of:

- Digital alarm clock + radio = alarm clock radio
- Bicycle + motorcycle = moped
- Car + caravan = camper

Stimulate your creative thinking by mixing &matching two random objects. Think of crazy things:

- Ladle + guitar = new percussion instrument
- Pencil + shoe = drawing walk
- Bakery + soft drink manufacturer = school lunch supplier



Zebra + clothing = zebra dress



Forest + buildings = green city