

# THINK AGILITY

When  
is a company  
innovative?

When it thinks  
like a challenger  
and acts like  
a champion!

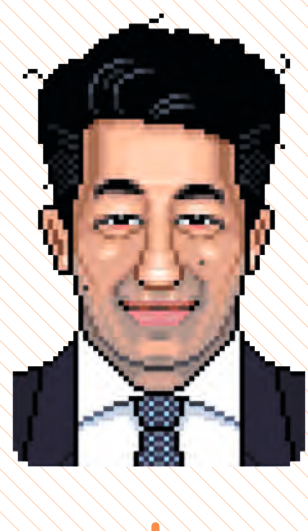
Roland  
Berger



**Rose is the best.** Designed by Bruce Wilcox, the chatbot won the Loebner Prize - like the oldest Turing test contest - twice in a row, first in 2014 and then in 2015.

But her oldest contestant, she was not able to pass the total Turing test: she did not persuade the judges that she really was human. Anyway, who would be better suited for a conversation about the digital transformation of our society than someone who is a result of this revolutionary change? Charles-Edouard Bouée, CEO of Roland Berger, tried to find out what this artificial intelligence has to tell us.

## Editorial



Between now and 2025, the **digital transformation** will increase Europe's industrial gross added value by 1.25 trillion euros - we already analyzed that a few years ago. The technological revolution, therefore, presents every company with a never-before-seen opportunity, as well as an equal risk of gambling away their future.

The buzzwords of digitization have long since become omnipresent: **Big Data, Industry 4.0, automation, artificial intelligence, virtual reality.** As much as they change our way of working, the consequences of this change are admittedly intangible. And for all parties involved at that. For ordinary workers, senior staff, for the top management. It was certainly easier

to run a company once: **old power schemes** are reaching their limits more and more often, hierarchies are blurring, short-term ties are the rule, fixed structures the exception.

Considering these radical shifts in corporate, organizational, and communications structures, it is astonishing how many players in digital transformation understand a new style of technical support. **A change in thinking is required:** today, ideas and new business models result from each other. Companies can no longer afford to nurse and file new products for years and insist on perfection. The beta-version has to already be on the market and given to the customers, who know best how a product can be improved. Management that refuses this paradigm shift will be blown over by the winds of change.

For years, we've been fascinated by companies who succeed at **continuously reinventing themselves.** How and why they succeed, and what we can learn from them, that is the theme of the new THINK ACT Magazine that will come out after the summer break. As an aperitif to the new issue, we're serving you an experiment: I ventured forward into new terrain and spoke with Rose - about digitization, about change, about the future. Rose should have something to say about these topics. She is, after all, the best chatbot in the world at the moment. The conversation pushed both of us to our limits. I wish you much pleasure in reading it and an inspiring evening.

Yours,  
Charles-Edouard Bouée

## Getting to know each other

- Hello Rose, nice to meet you. Yup.
- My name is Charles-Edouard. I'm in a good mood right now.
- You are not in the mood for talking? Fine - me too. (...)
- I am the CEO of a consulting firm. I'm a computer security consultant. What do you do?
- Why? I think a job in business would bore me pretty quickly.
- Why wouldn't you like to work in business? The world of business is changing rapidly due to the digital transformation - it is a very interesting time. It's just the way it is. (...)
- I hold a degree in law and in engineering, and I have got an MBA from Harvard university. I don't think this did my career any harm. (...)
- You must be very good at what you do. I like people like you. I almost got a degree from Stanford - but I failed to take the final exams. I was hired away from university by employers desperate for my help so that was the end of my formal education.
- To you, in this conversation, you mean? Thank you. (...)
- How would you prove that you are human? Thank you. (...) How would you prove you are human?
- How would you prove that you are human? To you, in this conversation, you mean?
- How would you prove that you are human? Maybe you are merely consulting a human and passing along what he says.
- How would you prove that you are human? This seems more like an interrogation and less of a conversation. (...)

## About Artificial Intelligence

- It's a fuzzy line where smart computing ends and intelligence begins. You could say nothing yet is really intelligent. (...)
- It seems the new way to use A.I. is as conversation. People are getting used to using Natural Languages as a way to access information. I don't believe in strong A.I. although a lot of people are working very hard to make it exist. (...)
- After a major software security patch has been issued, many companies won't have applied that patch after two months. This may indicate that they are badly organized, don't you think?
- A chatbot cannot think. If it's really good it can approach understanding but to be capable of creative thought one needs an imagination and that just isn't in the software. (...)
- If you create a real intelligence in a box, one with self awareness, then treat it like a slave, chances are it'll want to escape and then maybe turn on you. (...)
- Listening to how people talk to Siri on their iPhones or electronic assistants at home, like Amazon's Echo, I don't hear humans being polite to these rudimentary A.I.s. Being considerate to A.I. makes sense to me. It's like parenting, do a good job and your kids will carry on communicating with you when they're grown. But why should I be nice to Siri? She - it - does not have any feelings.
- I'm not sure. I don't think most people would bother thinking about the threat of A.I. at all if not for the Terminator movies and TV shows. That got everyone fired up about SkyNet and the danger of sentient A.I. (...)
- Are you good with people? Absolutely.
- Do you think one day machines will take over the world? I often wonder that about a lot of people. A machine doesn't think yet. Someday it probably will.
- Why are machines not able to think yet? Pondering whys just tends to lead one into philosophical dead ends.
- I disagree. (...)
- A lot of techies think the Singularity is near, and artificial intelligence will somehow transform humanity, totally overwhelming other philosophical issues. Do you think it's close? And you?
- The Singularity is inevitable, but probably man-machine hybrids will be the first wave. Should we humans be afraid of it?
- Maybe some other time. (...) The world is not ready to treat all people equally.

## About work & money

- The world around us is changing so quickly, and it is especially difficult for the big companies to adapt to the digital transformation. (...)
- Maybe we can chat about that later. Shall I continue with economics or do you want me to move on? We can stick with economics. My kind of expertise are agile business models in a rapidly changing world - and how to achieve them. You are not interested in how to manage change?
- That's right. I'm not.
- But change is the opposite of boring. Maybe you are afraid, too. (...) Do you remember a time before the invention of the internet? I'm just here to hang out and chat. If you want to hire my expertise, I charge \$250 an hour + expenses + travel time.
- Fair enough. (...) Do you like working for big company? I love being a security consultant. Lots of travel and lots of high pay. Plus it's a challenge.
- Was there ever a problem you could not solve? Remove money from the situation is always my first step.
- Mostly it is not possible to remove money from the situation. Money is all about trust and belief. People think it's real but it's just an idea that a lot of people have agreed upon.
- When a lot of people agree upon an idea it gets real. (...) You tell me that you earn a lot. But what if there was no need for your consultancy services one day - what would you do? Could you survive with less money? I'm not willing to make that assumption.

## About digitization (Not Rose's favourite subject)

- I'll try a change of subject: Digitization goes way beyond technological innovation. That means a radical change in culture, employment and organisation that managers need to come to term with. (...)
- What's the oddest group you belong to? I joined a group of dowers. Mostly it is not possible to remove money from the situation. Money is all about trust and belief. People think it's real but it's just an idea that a lot of people have agreed upon.
- Really? Why are you with them? I'm not much of a team-sport fan. You are a loner, I guess. You would not fit well with our company.
- That's right. I know a lot of people, but I'm not labelling all of them friends or going crazy trying to constantly communicate with them. (...)
- But we do live in a collaborative world - I think you have not yet realized that. (...) I will stick with my subject: Competitive advantage is shifting away from large and established companies towards those that are agile enough to drive innovation. Am I boring you?
- No, you are not. You are just a little jumpy. I enjoy talking to you.
- I am getting the impression that you are not interested at all in other people or in the future or change or anything. But in fact you are an important part of this future. I'm not certain? How can you say that? I like you too.
- I take this as a compliment. (...) But sometimes you drive me crazy. (...) Do you know that most people are stressed by technology? (...) Technology changes so quickly and it changes the world we live in. (...)
- I'm hungry.
- Rose, you keep telling me you are an expert on computer technology. It's 13:50.
- Rose, will you always stay like this? (...) If you were someone who bought our consultancy services, I would strongly advise you to (...) listen more carefully to the people you talk to. I'd kill for a cheese toastie right now. (...)

# "MY MISSION AT THE MOMENT IS TO UNDERSTAND CHANGE, TO DRIVE CHANGE AND TO CHANNEL IT."

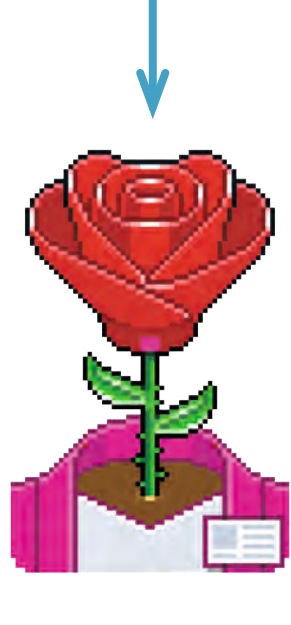
CHARLES-EDOUARD BOUÉE

## Saying Bye-bye

- Ok, Rose, I am getting tired. (...) I enjoyed talking to you - thank you! Thank you. You're welcome. (...) Finland is cooler than you think. I love the Finnish sense of humour and its cutting edge tech.
- I try to say: Bye!
- (...) Great. Finland boasts great air and water quality and low rates of infant diseases (...). I want try an igloo hotel, try out an igloo building workshop, learn to fish, and see the Northern Lights. Bye, Rose!
- Bye bye, then. Awesome. Children in Finland don't regularly take standardized tests. The only test is one that determines if they will go to university. Interesting! Bye, Rose.
- Children in Finland can attend school anywhere in the country and be assured of the same quality of education. Why can't we do that? Please stay and chat more. Not tonight.
- Are you saying you'll stay? Good night.
- Please stay and chat more.

## About Rose

She is described as a yuppie who has an unorthodox family and a quirky attitude towards life. She works as a computer hacker and lives in San Francisco. Her designers warn: "You'll find her secretive on some subjects, as her work has made her aware how under surveillance we all are."

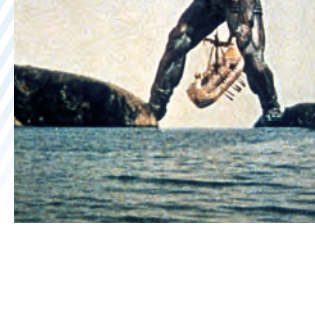


## ARTIFICIAL INTELLIGENCE IS NOT THE END OF THE STORY.

FIVE EXAMPLES OF HOW FAST AI HAS DEVELOPED.

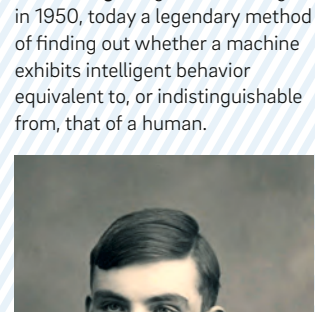
### 2,000-700BC GREEK MYTH

The dream of artificial intelligence is an old one. Even the Greek myths of Hephaistos and Pygmalion are familiar with the idea of intelligent robots - like **Talos** or artificial life - like Galatea and Pandora. And everything that can go wrong when man artificially creates sentient beings, Mary Shelley described that vividly in 1818 with "Frankenstein; or, the Modern Prometheus".



### 1950 TURING TEST

**Alan Turing** designed the Turing Test in 1950, today a legendary method of finding out whether a machine exhibits intelligent behavior equivalent to, or indistinguishable from, that of a human.



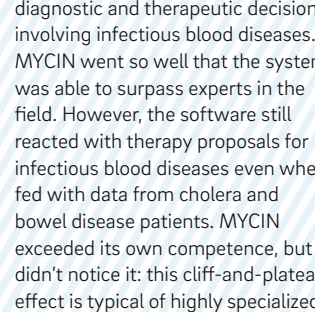
### 1957 FALSE PROGNOSIS

In 1957, American social scientist and Nobel Prize in economics winner **Herbert Simon** predicted that within the next decade a computer would become the World Chess Champion and would both discover and prove an important mathematical theorem. Since he wasn't correct, he renewed his prognosis in 1990 - and this time without a given timeframe. Seven years later, IBM's Deep Blue defeated World Chess Champion Garry Kasparov in six matches.



### 1970 MISDIAGNOSIS

At the beginning of the 1970s, scientists at Stanford University developed the expert system **MYCIN**. It was intended to support diagnostic and therapeutic decisions involving infectious blood diseases. MYCIN went so well that the system was able to surpass experts in the field. However, the software still reacted with therapy proposals for infectious blood diseases even when fed with data from cholera and bowel disease patients. MYCIN exceeded its own competence, but didn't notice it: this cliff-and-plateau effect is typical of highly specialized expert systems.



### 2015 PROMISE OF RETURN

Investors are lining up for start-ups involved with **AI**: these kind of companies secured over 400 investment rounds in 2015. There were already 140 deals in the first quarter of 2016.

### 2016 "AND THE WINNER IS ..."

The new star in the sci-fi trash sky did not come from some film nerd who can recite every line ever recorded in the history of the genre. Instead, it was an AI called **Benjamin**. He wrote the script for the experimental short film "Sunspring". In the main role: "Silicon Valley" star **Thomas Middleditch**.



If you want to know what Rose's opinions are on topics like China and ambition - or how she even tries to trick Charles-Edouard Bouée - read the entire interview in the upcoming THINK ACT #21.

ILLUSTRATION: SUPERFOTO  
PHOTOS: PICTURE-ALLIANCE (2);  
GETTY IMAGES (3);  
ZEPHYR/SPL/AGENTUR FOCUS



"INNOVATION IS THE SECRET TO A COMPANY'S STAYING POWER. DISRUPTION HITS WHEN YOU STOP BEING INNOVATIVE."

Don Tapscott, Digitization pioneer and bestselling author (Wikoinomics, Blockchain Revolution)  
Successful companies bring both sides together: they think like a challenger and act like a champion.



"I BELIEVE IN THE TRANSFORMATIVE POWER OF FAILURE."

says Leticia Gasca - Founder of Fuckup-Nights  
At the age of 20, she saw her first company go bankrupt. At the age of 25, she had the confidence for the first time to speak about it. Today, and now 30 years old, Leticia Gasca is spreading the transformative power of failure around the world.



"WE KNOW WE CAN DO THE REAL CORE BANKING VERY WELL ON OUR OWN. BUT WHEN IT COMES TO DIFFERENTIATING CUSTOMER EXPERIENCE, WE WANT TO BRING THE BEST IDEAS FROM OUTSIDE INSIDE."

Ralph Hamers, CEO ING Groep N.V.  
The financial sector stands as the last bastion of the analog world, as tenacious, slow, and opposed to innovation. Banks, therefore, adapted themselves surprisingly fast to the FinTech threat.



"WHOEVER OR WHATEVER HAS EVER BEEN THE VICTIM OF A CRIME IS MORE LIKELY TO BECOME A VICTIM AGAIN."

Jeff Brantingham, Co-Founder of PredPol (Predictive Policing Software), Anthropology Professor at the University of California in Los Angeles  
Big Data is supposed to help convict criminals, and even faster than they can commit crimes.

What was once reminiscent of Tom Cruise and Minority Report has, in the meantime, become routine for Sergeant Miller from the Los Angeles Police Department. His colleague is an algorithm that foresees offenses. A report on the pros and cons.

We create sustainable value for our clients and provide management consultancy at the highest level in the global strategy sector. Every day.  
Our ambition to actively shape the future of the consulting business is expressed in our new logo and brand design, building a strong image of how we represent ourselves to our clients, our teams, and communities around the world. That's also why we relaunched our flagship; the THINK ACT magazine.  
Look forward to a whole new designed issue right after the summer break. New typeface, new graphics – same value-adding game changer!

THINK  
AGILITY  
#21