"Finance is changing. We like it that way!"

———

Klaus Engberding,
CEO of the EOS Group

This issue may be over – but there's plenty more for you to read:
You can find our surveys, annual reports and
of course "EOS explore" as PDFs at

eos-solutions.com

EOS

explore

Cultural change
**Uncomfortable
is good**

———

Cybersecurity
**How does
a hacker
test work?**

———

How Europe pays
**The "European
Payment Practices"
Survey 2019**

———

Artificial intelligence

Man or
machine?

———

EOS

For a debt-free world

EOS was founded in 1974 as the debt collection arm of the Otto Group in Germany. Now, EOS is an international financial investor and service provider and a trusted partner to customers from a wide range of industries in 26 countries.

For Europe's banks, we are one of the leading purchasers of non-performing loans (NPLs). We take over receivables management for companies, municipal authorities and administrations, even across borders. Through our services we ensure liquidity and investments and safeguard jobs. However, our most important investments are in our employees and the technology that underpins our services. We would like to introduce some of them in this magazine.

20,000

customers
including banks, insurance companies and utilities, mail order firms and telcos, mechanical engineering firms and publishers, are looked after by our more than **60 subsidiaries.**

More than

7,500

employees
work for the EOS Group worldwide.

98

percent
of all paid cases in **international debt collection** are settled by us **out of court.**

Ireland
United Kingdom
Belgium
Denmark
Germany
Czech Republic
Poland
Slovenia
Croatia
Bosnia Herzegovina
Montenegro
Romania
Bulgarien
Serbia
Kosovo
Greece
Macedonia/
Republic of North Macedonia
Slovakia
Hungary
Spain
France
Switzerland
Austria
Russia
Canada
USA

The companies of the EOS Group are represented in

26

countries.

Through its **international network** of subsidiaries and partners, EOS offers services in more than **180 countries**.

Dear Readers,

At EOS we have the privilege of being at home in a lot of countries. We don't have to speculate about market conditions because we have our own people on the ground. We have data too. Every year, we poll 3,400 companies in 17 countries for our "European Payment Practices" survey.

This year's survey covered an issue that's very important to me, i.e., the innovation capacity of European companies. The data were disappointing, particularly where artificial intelligence is concerned. Most financial executives associate AI with anxiety about job losses. The second most common response was: "AI is just a buzzword and is completely overrated."

Fear and denial are not good strategies for dealing with such an important business issue. It worries me that there was a big gap between these responses and a positive statement like "I can hardly wait to work with artificial intelligence".

Anyone who knows me also knows I don't like hype. AI is not going to turn our world completely upside-down, but it would be foolish to ignore the rapid development of technology. In this issue we will show how we are exploring and testing the possibilities of AI at EOS – in the same way that we examine every promising technology to determine whether it can play a positive role in our business operations. By the way, the major exception in attitudes toward AI is Denmark, where there is much less anxiety about it than elsewhere. Denmark is also said to be one of the happiest countries to live in. Maybe there's a connection there, but I don't have the data to prove it.

Klaus Engberding,
CEO of the EOS Group

content

48

54

38

The EOS fiscal year 2018/19 in figures

Big visions –
optimum results

813.7
EUR million

795.0
EUR million

663.8
EUR million

596.1
EUR million

341.1

41.9 %
Germany

220.9

27.1 %
Western Europea

203.2

25 %
Eastern Europe

48.5

6 %
North America

2015/16   2016/17   2017/18   2018/19
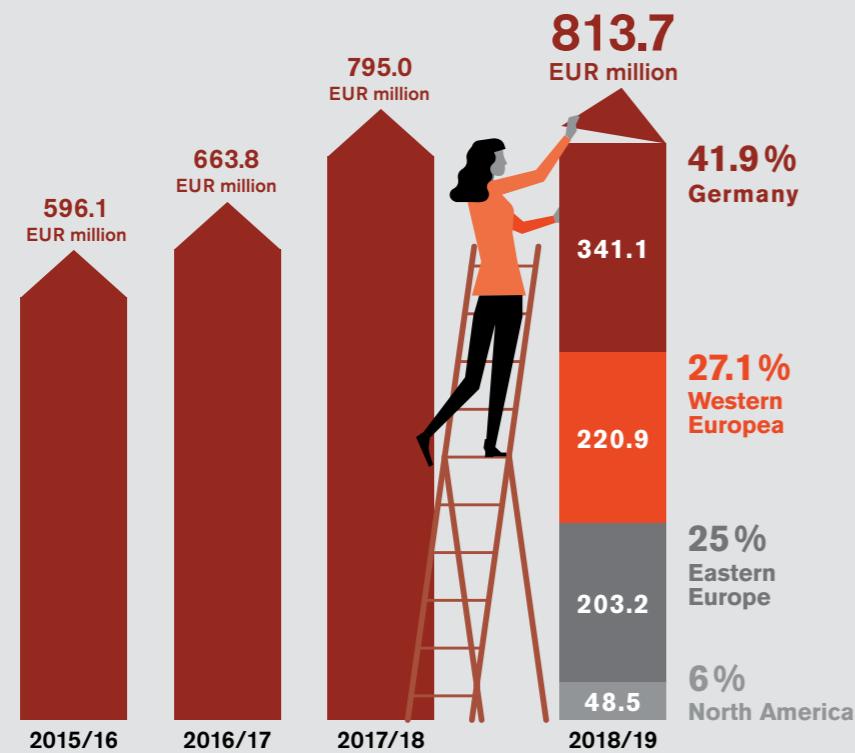
Excellent revenue growth

Since 2015, EOS Consolidated has been able to increase its revenue every year. In fiscal 2018/19 it totaled EUR 813.7 million, up from EUR 596.1 million in fiscal 2015/16. Once again, Germany is the region with the strongest turnover, having a 41.9 percent share within the EOS Group. Eastern Europe enjoyed the greatest growth with a share of 25 percent.

Core business exceeded expectations

In 2018/19 EOS Consolidated profitably exploited and expanded its strong market position – with top investments on a record-breaking scale:

Germany

78
EUR million

is the value of secured receivables and real estate purchased by EOS in Germany in fiscal 2018/19.

Western Europe

48
EUR million

is the value of outstanding receivables bought by EOS Aremas in Belgium through existing forward flow contracts in fiscal 2018/19.

Eastern Europe

46
EUR million

is the value of the largest unsecured portfolio that EOS acquired in Croatia in the last financial year.

Significant investments make EOS twice as strong

Purchases of secured receivables and real estate alone doubled compared with the previous year. EOS Consolidated invested a total of EUR 668.4 million in unsecured and secured receivables and buildings.

EUR 409.4 million

| unsecured | 105.7 | 141.5 | 109.0 | 24.9 | 28.4 |

EUR 259.0 miliion

| secured/buildings | 78.1 | 97.1 | 83.8 |

■ Germany   ■ Eastern Europe   ■ Debt Collection 4.0*
■ Western Europe   ■ North America

*EOS buys a receivables portfolio in a country in which it doesn't have its own company. The local partner takes care of the servicing.

EUR 10 million

were invested by EOS in IT core systems in the last fiscal year alone

Around 600 employees worldwide are driving the digitalization process forward at EOS.

For the complete
Annual Report 2018/19
go to:
eos-solutions.com

Well-equipped for digital transformation

EOS aims to be at the forefront of debt collection software and advanced analytics in the future as well. EOS Consolidated invested EUR 10 million in new technologies for processing receivables. Worldwide, around 600 IT experts are driving the digitalization process forward. Their most important projects are modern debt collecting systems and services, even more accurate data analyses and prediction models.

Greek servicing license

EOS Matrix can now offer even more

IN APRIL, EOS Matrix in Greece was licensed by the Bank of Greece. Now the receivables management company is authorized to represent its customers in all court proceedings and collect, negotiate, settle or restructure claims on their behalf. At the same time, EOS Matrix complies with the Greek Non-Performing Loan Law and the Code of Conduct of the Greek banks, including all consumer standards and consumer protection legislation. "We are very proud and happy about this development," says Managing Director Antonios Bayias. EOS Matrix has been operating in Greece since 2001 and employs 160 people.
gr.eos-solutions.com/

Mobile debt collection

Go Santa! Go Santa!

HOW CAN WE improve the success rate in receivables management? "Make it mobile! Pay your debts by smartphone!" It was this brainwave that led to an international EOS team beating 263 other suggestions in an internal ideas competition. Under the project name "Santa", the first EOS receivables app was realized in record time. What may be the smartest communication solution in the history of receivables management services went live in Romania on 1 March 2019. Croatia and other countries are set to follow.

„The team named the debt paying app 'Santa', because the first basic version, the minimum viable product (MVP), was supposed to be ready by Christmas 2018.

Debt-free in

30

**seconds
thanks to online services**

The German EOS Serviceportal posted an increase of more than 140 percent in user numbers in fiscal year 2018/19. It has proven very effective to take a "user-centric" approach, i.e., thinking from the users' perspective and adapting to their needs. A good example involves access to the EOS Serviceportal. More than 65 percent of users log onto the site, via smartphone, making it the most popular means of access. Consequently, when Apple Pay was launched in Germany in December 2018, the EOS Serviceportal was prepared to handle this secure payment option. Immediate bank transfer is the preferred method.

A

15.

Rating

Aaaaaaaaaaaaaaa-cing it!

SERIAL WINNER: In 2019, EOS Holding **got an 'A'** from Euler Hermes Rating, which said for the **15th year in a row** that EOS presents a low financial risk. A major reason for the rating is EOS Holding's **very stable cash flows** and consistently high earnings level. Postive ratings were given for the company's high level of expertise in the valuation, acquisition and recovery of non-performing receivables. Euler Hermes also acknowledged the market leadership of EOS in Germany and its strong market position throughout Europe.

Close to the action

Kirsten Pedd (Chief General Council EOS) and parliamentarian Heribert Hirte open the discussion at the opening reception for our new Berlin office.

THOSE IN THE KNOW should have a say when it comes to matters like consumer protection and debt collection. By setting up an office in the German capital Berlin, EOS is committing to an open culture of debate; at the opening reception, guests from government departments and consumer advice agencies had the chance to discuss relevant issues with Heribert Hirte (FDP), deputy chair of the Consumer Protection Committee in the German Parliament. This successful launch is to be followed by many other such meetings and discussions in the political capital.

NPL purchases

Your package has been delivered

Banks in Eastern and Western Europe are relying on EOS to reduce their exposures.

France

EUR 150 MILLION in 2018: This total makes EOS in France the biggest NPL investor in the asset class "non-performing mortgage loans". The debt package that EOS purchased from Crédit Immobilier de France is worth EUR 125 million alone. The bank will now reach its objective of eliminating legacy NPLs by 2035 (and will do so much sooner than expected) as a condition of government refinancing support.

Portugal

SIGNED, SEALED AND DELIVERED: Since 2015, the collaboration between EOS in Portugal and its partner ServDebt has resulted in the acquisition of half of all debt packages offered for tender, including the recent purchase of a portfolio with a receivables value of around EUR 115 million. EOS provides the capital and ServDebt handles the debt recovery process. Not an easy task when dealing with nearly 30,000 defaulters.

Bulgaria

EOS IN BULGARIA has purchased an NPL portfolio worth over EUR 350 million, the biggest secured loan deal for the Bulgarian market so far. The deal was made in March 2019 after eight months of negotiations with Postbank subsidiary Eurobank Bulgaria. One of the most important conditions is that even after the sale, Postbank customers can continue to repay their loans at the same conditions.

Serbia

EOS MATRIX completed the acquisition of one of the biggest NPL transactions. The Deposit Insurance Agency for and on behalf of the Republic of Serbia and the Autonomous Province of Vojvodina sold the portfolio consisting of secured and unsecured overdue corporate loans with approx. EUR 240 million face value to EOS. This investment strengthens the EOS footprint on the Serbian market and consolidates our strong market position.

Cultural change in action at EOS

Photos: Achim Multhaupt, EOS

"We are becoming open to new things, and everyone sees the need for it."

**Thomas Walter,
EOS Technology Solutions**

Software expertise: the Kollecto+ Board

THE KOLLECTO+ BOARD is all about teamwork instead of countries going it alone. This international team is coordinating the development of the EOS cross-border receivables management software. The team members, who usually meet in a virtual space, are now meeting regularly in person to share their experiences, hold discussions, create synergies and clarify requirements. The magic word from the Vienna meeting is "inner source", meaning that IT departments can work on the software separately, provided they share their results with everyone else.

dossier ᴺᴼ 1

Mastering
the machines

Artificial intelligence (AI) can do a lot of jobs for us, but many companies are still reluctant to use it. What can AI do, what are its limits and what's needed to realize its full potential?

Illustrations_Joanna Gniady   Text_Thomas Soltau

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EOS explore   02_2019

How to train artificial intelligence properly

Artificial intelligence can diagnose illnesses, analyze voices and predict behaviors. But if trained using the wrong data it also makes embarrassing mistakes.

> "Only clean data prevent machines from making the wrong decisions."
>
> **Andreas Dix,
> Data Scientist at EOS**

Data are to machines what experiences are to humans," said Julian Kramer, Chief Experience Ambassador at Adobe in a recent interview. So if you train self-learning algorithms using the wrong data, you shouldn't be surprised if you get puzzling results. Two years ago, the "hotness filter" from the photo editing app Faceapp demonstrated what can go wrong. The filter lightened photos of dark-skinned people because the Artificial Intelligence (AI) had been trained using a database of Caucasian faces. If the AI training had taken account of all ethnic groups, the mishap would not have occurred. This kind of imbalance in the data used to train an algorithm is known as "bias".

Put at a disadvantage by poor data

Someone who knows how to feed AI systems correctly is Andreas Dix from the Data Science Team at EOS. The IT specialist trains machines to take over repetitive and time-consuming processes. "Only clean data prevent machines from making the wrong decisions." Dix too can give an example of poor training. Until 2018, Amazon was using a machine-learning supported tool to rate job applicants until it emerged that the system was discriminating on the basis of gender. The online retail giant had used mainly old applications, mostly from men, as the basis for training the machine learning model. "And the system drew corresponding conclusions. The program rated as bad any references to 'women's' and this had a negative impact on the final rating. Female job applicants were being systematically disadvantaged," says Dix.

Few rules, high accuracy

One way of avoiding these kinds of mistakes is through proper data exploration. This means approaching the dataset without hypotheses. Afterwards, the expert tries to find out what kind of usable information the dataset contains. Are there variables in it that do not have any dispersion? Or does it include variables that have too many missing values? These data should be excluded because they can incorrectly influence the outcome. "We need to know exactly where the relationships are, so that artificial intelligence works properly based on our training," says Dix. The machine learning algorithms need clean data to recognize structures and draw conclusions. The rules and conditions set up by the algorithms during the training must not be too specific, because they then will have no value at all for making a prediction. This is then referred to as over-adaptation. It would be better to take a more general approach, i.e., find fewer specific structures, and achieve good accuracy as a result. This can be done, for example, by optimizing the hyperparameters of the algorithm and by having more training data.

Fully automated receivables

In receivables management at EOS, AI-supported software is used to predict the next best or most promising step in approaching the defaulting payer. The data in the system about the receivable and the consumer involved are at this point collected, aggregated and anonymized. Then all models are queried with these data to predict the potential success of each collection activity for this particular receivable at this time. The question is how much payment inflow can EOS expect as a result of this measure? The idea is to initiate the activity that is likely to be the most successful. But before that, the results are →

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EOS explore   02_2019

Photo: Achim Multhaupt

filtered again according to criteria such as compliance with statutory regulations. Finally, the debt collection software proposes the activity that gets the best score after all criteria have been applied. Depending on how the defaulting payer reacts, the data on the receivable will change, so that in the next step the models can make a new prediction tailored to the new situation.

Measurable success

The use of AI systems at EOS has already delivered measurable results. "Here at EOS in Germany, where we have been making productive use of the data-driven AI system D3, Data Driven Decisions, to control the collection process, we have seen payment receipts increase by around 10 percent," says Dix. "This means that we are achieving five percent higher earnings after activity costs compared with our previous receivables processing system."

Could human beings at some point become superfluous to these processes because machine learning programs take on a life of their own? "Ultimately, systems with artificial intelligence are a useful complement to human input," says Dix. "But the human being who controls the process and takes major decisions is still the most important factor. And every company has to take responsibility for this." ∎

One of the most impressive performances by artificial intelligence was delivered by the IBM system Watson when it beat two reigning champions in the TV quiz show "Jeopardy" in 2011. Its capacity for learning, understanding language and hypothesizing has made the system attractive for a large number of industries.

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Innovation

50%

of all AI patent applications …

… have been submitted in the last six years, clear evidence of the current boom in this area of research. According to the UN organization for intellectual property WIPO, 340,000 inventions have been registered since research in AI began in the 1950s. Machine learning is at the forefront, with one-third of all patent applications coming from this area. The most important functional application now is image recognition while the fastest-growing segment is robotics and controls. The leading companies in the field are IBM and Microsoft and the only European firms in the top 20 are Bosch and Siemens.

To learn more got to: **bit.ly/ai_innovations**

Robots on trial

On the factory floor, in autonomous vehicles or the operating room, more and more systems with artificial intelligence are being used in the work environment. But who is responsible when they make mistakes?

Anyone who relies completely on the safety of autonomous vehicles must reckon with hurtling towards a disaster. That's what happened in the case of the self-driving Volvo from the fleet of ride-sharing service Uber, which knocked down a woman who was crossing the street in Arizona in 2018. Just six months later, the public prosecutor in charge ruled that it did not hold Uber criminally responsible. Initially, the experts assumed that there had been a software error. They later said that the safety driver was allegedly watching videos on her smartphone during the drive.

Don't rely solely on AI

A similar case was the first fatal accident with an autonomous Tesla. Even the best technology does not release the driver from the responsibility of keeping his eyes on the traffic – for the time being at least. Autonomous driving is still a comfort feature designed to make long drives more pleasant. But in future, artificial intelligence (AI) will be alone at the steering wheel, while passengers work or – as envisaged by the business model – take advantage of the for-a-fee entertainment options on board. The

question of who is liable in the event of accidents is the first major legal debate of the AI era. Until now, it has tended to be the exception to hold a car manufacturer liable in the event of accidents.

Autonomous car as legal test case

However, cars are a particularly visible application. Artificial intelligence has been making important decisions in many areas for quite some time now. Image recognition systems mark passers-by as suspects, HR systems filter job applicants and robots assist doctors. What happens if these machines make mistakes? Are the programmers then liable? Who can judge whether the algorithm or the data it was fed was at fault? "At present there is no country in the world with a legal system that makes specific provision for AI systems and smart robotics," says legal expert Martin Ebers, President of the Robotics and AI Law Society (RAILS). In 2018 the EU Commission adopted an AI strategy and established an expert panel to look into a reform of the product liability guidelines, for example.

Until now there have been only a few legal actions due to AI errors. A lawsuit con-

cerning an accident at the VW plant in Baunatal in Germany, in which a factory robot fatally injured a 21-year-old worker, attracted a lot of attention. The proceedings were abandoned because the victim had apparently incorrectly set the robot himself. The outcome of the first such legal action, in which an investor from Hong Kong is filing a suit because an AI-powered trading system caused him to lose his money, is still pending. The supercomputer K1 was supposed to manage a USD 2.5 billion portfolio, but on Valentine's Day 2018 alone it burned through USD 20 million.

The investor is now suing the service provider Tyndaris for USD 23 million in damages because the firm is alleged to have exaggerated the capabilities of the AI. Tyndaris in turn is suing the claimant for outstanding fees amounting to USD 3 million and disputes the claims, saying that the company had never given any guarantees about making a profit. ∎

Robotics and AI Law Society:
ai-laws.org/
EU Commission AI Paper:
bit.ly/ai-for-europe
EU High-Level Experts Group on AI:
bit.ly/ai-experts

Photo: Seth Wening/AP Photo/dpa

Data with soul

Combining artificial intelligence with insights from behavioral economics results in very accurate predictions. And they tap into heart and mind on the right channels.

E very day, we make conscious or unconscious decisions. Behavioral economics tries to explain how and why we do something. When companies see through the patterns of their customers' behavior they gain many benefits. Although we generally do not act rationally but rather illogically or emotionally, behavioral economics experiments show that our decisions exhibit clear patterns that make them somewhat predictable. In the debt collection segment, these insights can be applied systematically to defaulting payers.

Achieving a goal by appealing to morals and ethics

Here's an example: Are defaulting payers more likely to be persuaded to pay by appealing to their morality and ethics or by a no-nonsense reminder letter? This is precisely what an Indonesian bank tested in a field study. The researchers sent defaulting credit card customers a reminder letter one day after the payment deadline. Before a further grace period expired, the customers from the group under investigation received another letter. However, this letter contained an Islamic saying about the immorality of not paying your debts if you are able to do so. The results indicated that the moral appeal increased the repayment rate by 20 percent. At the same time, a control group was sent a normal letter which elicited no response. The researchers also found that consumers responded more strongly to the moral appeal than to a reduction in repayment installments, for example.

"We have to offer defaulting payers the prospect of a solution."

**Jörg Schweda,
Managing Director
EOS Deutscher Inkasso-Dienst,
Germany**

New approaches in receivables management

Companies vary their approaches to defaulting payers to find what works most efficiently and effectively. One option is to combine digital communication channels with proven approaches from behavioral science and a data-driven algorithm. Using a fully automated approach tailored to the specific consumer will ultimately be more successful. The company evaluates the situation at the level of the individual and in doing so achieves higher repayment rates. "It is important for debt collection companies to encourage people to settle their debts," explains Jörg Schweda, Managing Director of EOS Deutscher Inkasso-Dienst (EOS DID). "We have to offer defaulting payers the prospect of a solution."

Difficult balancing act for start-ups

"InsurTechs" show how complicated it is to combine behavioral science and data-powered algorithms. Online insurers like Lemonade or Oscar advertise that they settle claims quickly by using artificial intelligence (AI) and clever algorithms. The underlying idea is certainly consumer-friendly. Customers can take out insurance cheaply with just a few clicks on the app or website. The process of obtaining insurance runs almost completely via AI bots. Claims reportedly are settled in just a few seconds, and this includes checking, decision-making and payout. But who knows whether insurance fraud isn't involved in some cases? "One of the things we still didn't get right is our Loss Ratio (the percentage of premium that's paid out in claims). It's still in the red, and about 60% higher than where we'd like it to be," writes Lemonade founder Shai Wininger in his blog.

Human-machine interaction

Human-machine interaction is regarded as the key factor in staying ahead of the competition. The availability of huge volumes of data allows self-learning algorithms to improve the accuracy of their predictions. Given the right data, AI systems can then automate and scale up. This is possible, however, only if the tools from the behavioral economics toolbox are used appropriately. AI needs an even stronger integration of the consumers' environment with all its emotional responses, specific needs and consumption motives. Ideally, companies will then generate "data with soul". ∎

Always finding the right tone

A digital coach that supports every phone conversation in the call center, constantly gives tips and analyzes script management? That's what AI systems like i2x can do. But do these innovations lead to more satisfaction for both parties?

We have long since become used to friendly synthetic voices taking us through the menu when we make a customer service call. And to be honest, it is actually nicer to hear someone who is consistently cheerful than to speak with a stressed member of staff who is in a bad mood. Voicebots, which communicate with the caller using AI-based language functions, have been making great strides in communication possible for years now thanks to new technologies like Natural Language Processing (NLP) and ASR (Automatic Speech Recognition). On the human side, emotional analysis tools help stressed call center agents to find a balance between calmer and more strenuous moments. It's designed so that stressful conversations are evenly distributed among the call center workers. This is a sensible option for both customers and staff. So far so good.

But what happens if a "coach" is telling agents they are using certain terms too much or too little, analyzing their script management and giving hotline staff suggestions for improvement?

Big Brother-type surveillance or genuine support?

Michael Brehm, the former CEO of the German social network StudiVZ, has developed just such a model with his company i2x. "Software that empowers you to do your job better while helping you learn," is his promise. As it is almost impossible to train agents at call centers during operating hours, and staff motivation drops in the face of constant criticism, Brehm's special software is filling this gap. During the phone call, certain key words are suggested to the agent on the monitor and ticked off if they are used during the conversation. The system also recognizes filler words or phrases and points them out to the agent. In addition, i2x automatically converts the call center agent's share of the conversation into a log so that team managers can see exactly how their staff members are performing. For many people this all sounds a bit like George Orwell's vision of Big Brother, with the human being as the plaything of technology. But the issue has to be considered from different perspectives.

Greater efficiency through technology

Thanks to the ubiquitous nature of smartphones, following the instructions of a navigation device or asking Siri to compile a playlist is simply part of our daily routine. Over time a relationship of trust has been established. Most people don't even object to aircraft being landed by autopilot. If AI is useful and explicable, then people will build up trust over a longer period. But in case of doubt the decision is still ours. Trust brings about improvements – this is Brehm's response when asked about total control. "After all, we want to help call center agents to do their job better."

Take the threat out of AI

At any rate, his customers are satisfied with the system. Moreover, the software can help to inform all call center staff about new products or new features of existing products.

Like many companies, Deutsche Telekom is using AI in the customer service environment. "Fundamentally, a customer service department can afford to use AI only if the people working there see it as a help to their day-to-day work and not as a threat to their existence," explains Oliver Nissen, VP Social Media and Services, in an interview. At Telekom, the aim is for a bot to be used only if it can perform at least as well as the people employed. And there's the rub. AI is not yet fully capable of having a genuinely deep understanding of verbal utterances that it has not been trained or programmed to recognize.

With i2x, Brehm would like to help call center agents to find the right tone. Time will tell whether this will succeed in practice. The benefits are obvious. Ideally, customers will receive a more personal and consistent level of service, while companies in turn will have more influence on the outcome of the interaction. And in a best-case scenario, call center staff will be more relaxed.

Human-machine interface

But there are limits to AI. Such systems are no substitute for a conversation between two human beings about a customer service issue. There will always be a need for common sense, emotional intelligence and empathy. The greatest benefit of AI is as an interface between human and machine when it complements the tasks done by staff. The more support AI provides, the more likely it is that people will feel they are being looked after by customer service.

i2x

Before Call — During Call — After Call
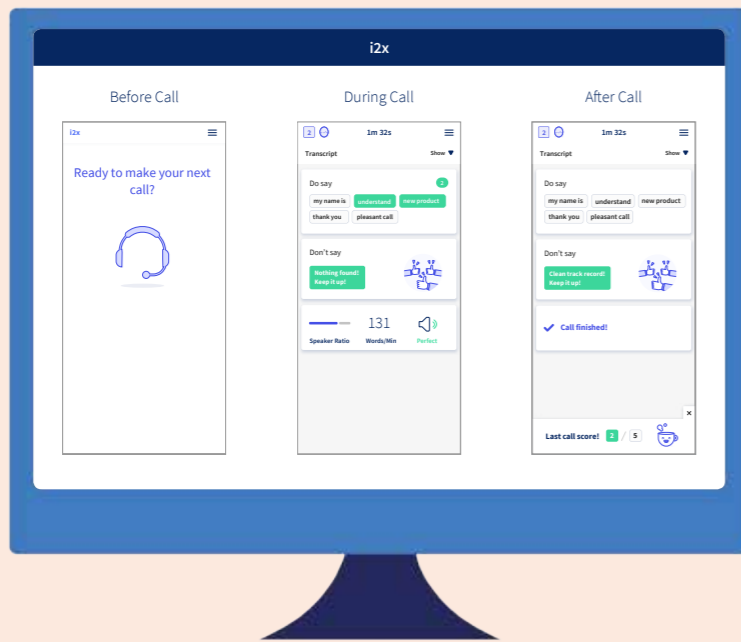
Before Call
The AI is running via the cloud and is connected to VoIP systems.

During Call
Analysis and live feedback: How fast am I speaking, is my counterpart getting to say anything, how often am I using clichés? In addition, the conversation is transcribed in real time.

After Call
The conversation is then available for analysis.

Michael Brehm is the founder and CEO of i2x GmbH. Through his start-up he wants to change the call center industry.

Tailored to market conditions: The core receivables management system OYO (Optimize Your Operations).

Together we know more

It's set to become the "super brain" of EOS. The Group's national subsidiaries are working with the Center of Analytics to develop models based on their data. France is the first country to be connected to the central analytics platform.

What's so hard about debt collection? The process seems simple to outsiders. If you don't pay a bill, you get one reminder after another until you do pay or, in worst case, you get taken to court. "It is absolutely not that simple," says Joachim Göller. "Do I send a dunning letter? An email? Do I make a phone call? How much extra time do I give the debtor to pay? The best action to be taken next in a collection process can be completely different from case to case." Or from country to country: "What works in Germany can be entirely the wrong thing to do in France."

When it comes to what works where, hardly any other company has better data than EOS, which boasts 26 national subsidiaries and 20,000 customers. It's Göller's job to make the data even more useful. Göller is the Head of the Center of Analytics (CoA). This team of data science experts is working on an analytics platform. Through the platform, the CoA is providing a technology which

colleagues can use to develop and deploy their models in the countries quickly and easily. In addition, in the analytics community colleagues consult closely with one another on models and best practices. The vision is that the national subsidiaries will be collectively smarter by handing over their data – in anonymized form of course – to the central platform. With the help of machine learning algorithms, the platform can evaluate thousands of country-specific collection processes and detect patterns, to see which collection step works particularly well under which circumstances. These insights then flow back to the EOS national subsidiaries for use in their own debt recovery processes. "What we are building here is something like an 'EOS super brain' which will be fed with data from colleagues in the other countries. When different debt collection steps are being considered, the countries' systems send inquiries to the AI on the →

Fotos: GaudiLab/Shutterstock (M), Sebastian Vollmert/EOS Illustration: Gutentag-Hamburg

"What we are building here is something like an EOS super brain."

**Joachim Göller,
Head of Center of Analytics
(CoA)**
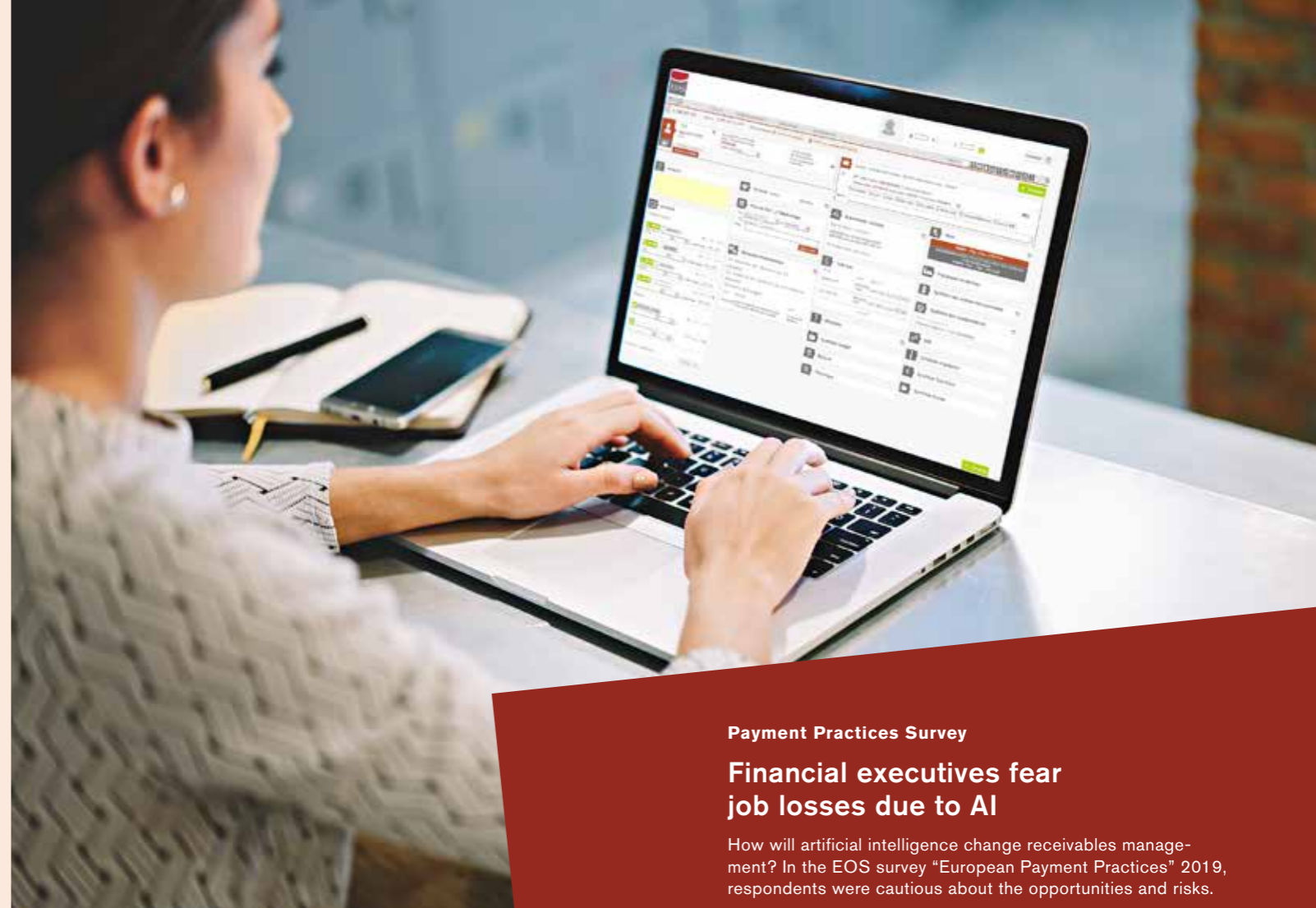
Financial executives fear job losses due to AI

How will artificial intelligence change receivables management? In the EOS survey "European Payment Practices" 2019, respondents were cautious about the opportunities and risks.

For more information go to: **bit.ly/EPP-2019**
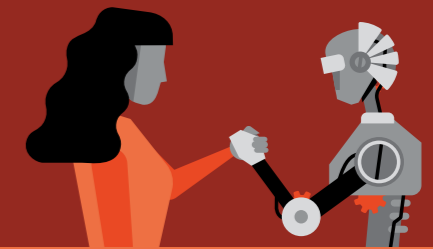
Supporting and challenging

The use of artificial intelligence in receivables management puts jobs at risk	47
Artificial intelligence is just a buzzword and is completely overrated	36
Artificial intelligence will drastically reduce the error rate in receivables management	30
Self-learning systems are needed in receivables management	25
I can well imagine having complete confidence in artificial intelligence	19
I can't wait to work with artificial intelligence in receivables management	18

Percentage of answers 1 and 2 on a scale of 1 ("agree completely") to 5 ("don't agree at all")

analytics platform, which then provides information about e.g. the payment amount and the likelihood of collection, depending on the person and the activity."

A milestone has now been reached. Since last October, EOS in France has been connected to the analytics platform. The colleagues in France work with the OYO (Optimize Your Operations) core receivables management system, which is tailored to market conditions in France – but for a specific defaulting payer they can now retrieve information on the expected payment in real time and use it to determine the best actions to take next. "Previously they could make predictions only for entire customer segments," says Marianne Hügel. In her capacity as Senior Manager in Business Development & Consulting, she is working with her team and colleagues in Western Europe to implement innovative and data-driven processes in the region. "We want to provide all colleagues with technologies and methods that make even faster and more reliable predictions."

The initial experiences have been very positive, says Hügel and have yielded evidence about how good the new process is. The "Triumph" project tested the combination of analytics platform and analytical process control for a fiduciary client account. Only the calculated score determines which steps are to be taken and when the collec-

tion process is stopped. The outcome of this first benchmarking is that the new collection process was more efficient and cost-effective. In several stages the number of cases was expanded, and management of the contract is based entirely on the predictions of the algorithm.

The system keeps learning – the human beings do too

"This pilot project means a lot to EOS in France because we are very interested in synergies within the EOS Group," says Laurent Redois, Head of Statistics at EOS France. "No country can be successful alone, and it is important that we share expertise and technology."

Nicolas Cabaj, Head of Statistical Studies at EOS France, is also delighted about the knowledge-sharing process. "The close collaboration has taught us to work with modern tools and methods. Although all members of the project team work in different cities, we managed to achieve quick progress and effectively share information." Redois is already looking to the future. "We aim to stay competitive, so we are moving away from processes set in stone towards a continuously evolving work flow that is regularly reviewed and compared and is based on the latest technologies and analytics. In the same way that our models learn we too are also learning." ∎

> "By creating important synergies with our colleagues worldwide, we will change how we solve problems and use new technologies. We are going to become much more efficient."
>
> **Nicolas Cabaj,**
> **Head of Statistical Studies,**
> **EOS France**
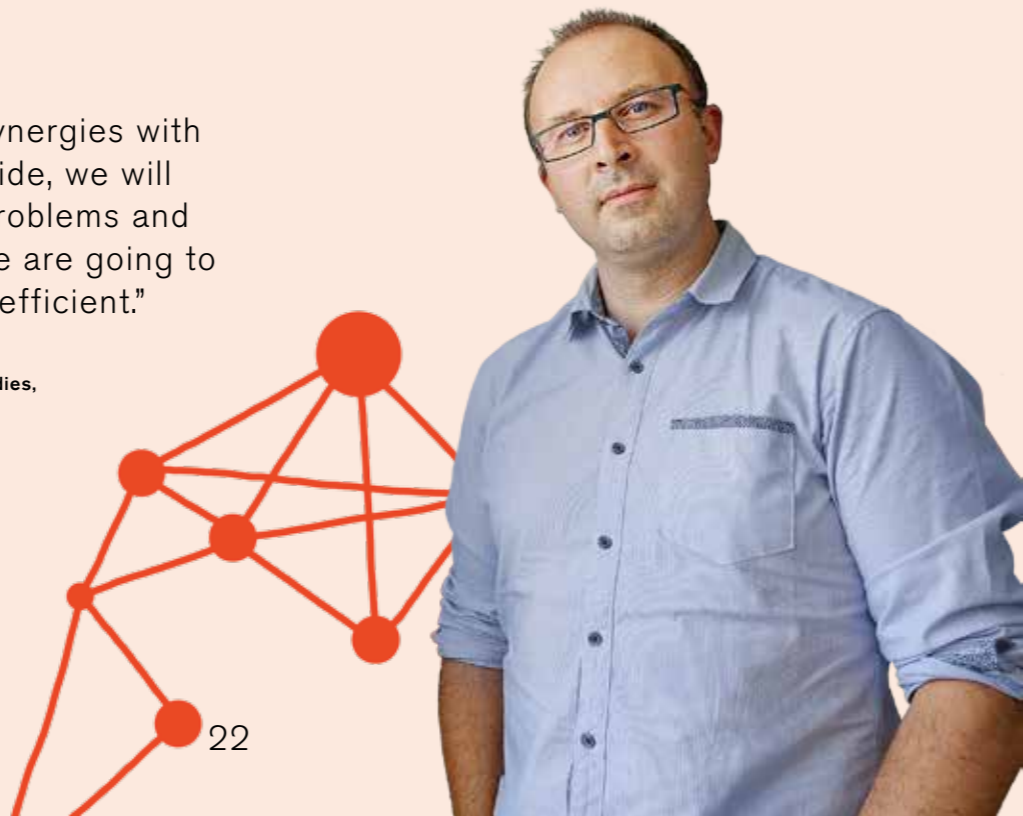
Getting out of debt sooner

Harmonized insolvency regulations throughout Europe and a maximum three-year discharge period for personal bankruptcy are the key components of the new EU Directive on Restructuring and Insolvency. They now have to be implemented into national law.

Insider viewpoint

"We take a very critical view of that."

The EU member states now need to implement the new insolvency directive into national law. Is this a good development?
MARTINE T'JAMPENS: It is certainly a good thing that we are getting standardized rules in Europe. The effort needed to implement them will differ a lot from country to country. In Belgium, for example, we already have an insolvency law that largely corresponds to the new EU directive.

What do you think of the maximum three-year discharge period for personal insolvency?
I am very critical of it. When we work with people in debt our aim is to help them get their finances under control. There's no need for debts to become a drama. We give the defaulters advice and work with them to develop long-term repayment plans. After all, these are mature people who accept responsibility for having taken on financial obligations that they failed to manage properly. The legislation should not be implying that they can evade this responsibility more easily.

Will the new directive also affect company insolvencies?
Probably not. The problem is not how long the restructuring takes, but that companies have not had their finances under control and have ignored warning signals for too long a period. Seventy to 80 percent of companies do not survive insolvency.

Martine T'Jampens
Managing Director of EOS Contentia in Belgium and President of the Belgian Collectors Association (ABR-BVI) since June 2019.

What consequences do you expect from the shorter insolvency discharge period?
STEPHAN MADAUS: In France, for example, a brief discharge of residual debt has not caused any problems. If a debtor is not capable of repaying his debts, then even long discharge periods like we have in Eastern Europe or Germany don't help. In the case of debtors who are capable of repayment, it should be possible to set up three-year payment plans so creditors will know what they can expect to recover. Unfortunately, the directive does not address this issue.

So a lot will depend on the implementation into national law.
Yes. The member states will decide for themselves whether the three years begin at the opening or the end of the insolvency proceedings. They also define what an "honest debtor" is. A new entrepreneur may be regarded as "dishonest" if he is simply overwhelmed by the accounting required.

What does that mean for the start-up culture?
If we want entrepreneurial individuals to be able to make use of their experience following a failure and start another new business, we need a solution for the discharge of residual debt. However, the ideal scenario is to avoid the insolvency in the first place. The EU Directive enables companies to work within legal frameworks to restructure their debts before this happens. Whether this will help SMEs will depend on the extent to which they can obtain relevant advice at low cost.

Stephan Madaus
Professor of Civil Law, Civil Procedure and Insolvency Law at the University of Halle-Wittenberg, Co-Chair of the Academic Committee of the International Insolvency Institute and Founding Member of the Conference of European Restructuring and Insolvency Law (CERIL).

Outsider viewpoint

"Creditors will know what they expect to recover."

Photos: EOS, PR

Why the euro is not mobile

The future of mobile payments is being shaped in Asia and the USA. No European provider has been able to get established so far, while credit card companies and technology giants like Apple are dominating the market. Some local start-ups are ready to launch.

Text_Gerrit Wiesmann

Travelers know that cash is still king in Germany. Whip out your credit card here like you would in Sweden or Slovenia and you may be in for an unpleasant surprise. That makes a new sight at cash registers even more astonishing. Instead of reaching for their wallets, customers are taking out their smartphones. Since 2018, US technology giants Apple and Google have been offering their payment services in Germany and disrupting the market for mobile payments. European providers are concerned, because the future of payment is being invented elsewhere, for example through Alipay and WeChat in Asia. Try to pay with a credit card there and the response will often be a dismissive smile, because consumers are using messenger apps for online and offline payments.

The European launch of Apple Pay and Google Pay got a lot of media coverage, but Korean smartphone giant Samsung is also trying to get a foot in the door with its Samsung Pay app, which so far is limited to Russia, Sweden, France, Italy and Switzerland in mainland Europe. The Swiss payment app Bluecode, which was initially introduced in Austria and more recently in Germany, has had a much more modest impact on the market. It is competing with apps from the publicly-owned German savings banks and loyalty card vendor Payback. "Alongside established market players, technology vendors and fintech start-ups are trying to win a share of the payment market through innovative products and services," says Christian Meiske from management consultancy ZEB. The competitive pressure is high, but so is the

market potential. In Germany, for example, there are 114 million cards with payment functions in circulation, even if they are only catching on very gradually for everyday transactions. Customers paid more often with cards than cash in the bricks-and-mortar retail segment for the first time in 2018.

The payment service provider not only earns transaction fees with every non-cash payment, but also profits from contact with consumers throughout the entire customer experience. "Mobile payment alone does not solve any customer problems," says Michael Eichhorn, Director Digital PoS and Pay at Payback, the largest loyalty card program in the German retail sector. "We believe in providing a service package; in our case it's the combination of collecting points, redeeming vouchers and mobile payment in one app."

The market is dominated by credit cards

Customers install the Payback app and store their bank details. After a PIN has been entered the app generates a QR code which is scanned at the cash register to trigger a direct transfer via the European SEPA payment system. Bluecode also uses SEPA (including QR code); while the app from the German publicly-owned savings banks and cooperative banks is replacing debit cards at the cash register.

All other providers of mobile payment services process the payment via credit card, so they are based on the US payment systems Mastercard, Visa or Amex. On Android, these providers are Deutsche Bank, for example, plus all banks that offer their customers Google Pay, like Commerzbank. On iPhone, all payment apps need to use the in-house system Apple Pay, which is also based on credit cards.

"We are European as long as we are paying cash," says Bluecode CEO Christian Pirkner. "It's all over as soon as we want cashless payment." He attributes the failure of Europe to establish its own systems to parochialism. "The German Girocard is the best example; it's a debit card that doesn't work outside of Germany or online." To date, Apple Pay has not worked in combination with Girocard. Although the German Savings Bank Association (DSGV) talks about "very positive discussions with Apple", so far customers can use Apple Pay with Mastercard, Visa, Amex and Maestro cards.

That's a problem for the savings banks because Girocard, the largest remaining European card system, is their cash cow. Industry insiders say that if Apple were to charge the same for Girocard transactions as for credit card payments, it would skim off up to three-quarters of the fees.

Unilateral national approaches are detrimental

The rules that govern most everyday mobile payments are not written in Europe. This is something that the European Commission and the German central bank publicly complain about, also in light of political developments in the USA. Bluecode and the payment services Momo Pocket from Spain, Pagaqui from Portugal, Vipps from Norway and ePassi and Pivo from Finland recently announced that they want to develop a European solution for mobile payments based on SEPA and Alipay's QR technology.

"The race has not yet been decided," says Meiske. "But it is likely to be difficult for new players who have to invest in the acquisition of retailers and consumers and offer the customer a distinct added value." Bluecode CEO Pirkner is convinced that only a European system in which national providers work together can prevent US dominance of this market. He warns: "Whoever controls the payment transactions controls the customers." ∎

"We are European as long as we are paying in cash."

**Christian Pirkner,
CEO Bluecode**

Bypassing the bank

Lending a friend money, splitting a restaurant bill or putting together for a gift: peer-to-peer payment apps are intended to make all this an easier alternative to cash or bank transfers. The most well-known method is Paypal's "Send Money" function, which is free to private customers – allowing the US provider to embed itself even deeper into their everyday lives. Paypal has bought up rivals like Venmo and Xoom, and its most important competitor is Square, the second company owned by Twitter founder Jack Dorsey. German start-ups like Cringle, on the other hand, could not hold their own in this environment. Apple Pay users can also send money using the messaging function just as WeChat or Alipay users in Asia have been doing for a long time. Facebook has integrated payment functions into Messenger and wants to set up its own financial ecosystem using its crypto-currency Libra.

Photos: Apple Pay, Christian Pirkner/Blue Code International AG

What your data trail reveals

Just the handful of data generated by an online purchase is enough to yield a credit score that's as sound as one calculated by a credit rating agency. A research paper by the Frankfurt School of Finance & Management shows how important your digital footprint is.

Mr Burg, from the data that every online store collects about its customers, your team was able to produce a credit score that is as good as one provided by a traditional credit scoring agency. How did you figure out that something like this is possible?
VALENTIN BURG: Since completing my doctorate I have been working in an e-commerce company that sometimes gets very imprecise results from credit rating agencies. This is a problem because we also offer payment on account, which is the equivalent of giving the customer a mini loan. So we asked ourselves: What do we know about those customers who defaulted on payments? What attributes could we use to evaluate creditworthiness? I talked about this with a former colleague who works at the Frankfurt School of Finance & Management and it turned into a research project.

Your model takes account of simple factors such as the customer's email service provider or whether he uses an Apple or Android device. What is the reasoning behind this?
We took an intuitive approach and looked at what factors might make sense. For example some research shows that people with Apple devices tend to have higher incomes. An email address may indicate income too. Can the consumer afford a provider like T-Online or does he use a free service? Other factors are based on behavioral theory. Someone who comes to the online store via an advertising banner is perhaps more of an impulse buyer than someone who comes after visiting a price comparison website.

Do you check whether your interpretations are correct?
That wasn't the objective of our research. We are less interested in why these variables play a role than in knowing that they do play a valid role.

But if consumers hear that a certain email address or type of phone affects a credit score, they can get around that.
Our observation is that people are not doing this to any great extent because such changes are associated with a lot of effort and expense.

Can you use your model to also establish customer profiles and make long-term predictions?
We looked only at short-term loans that are due after one month. The data doesn't tell us what someone's credit standing will be like over several months or years. If I were the operator of an online shop, I would make a new assessment each time the customer shops in my store. I would check regularly to see whether the variables are still valid or if other variables have taken on a bigger role.

This is a very different approach to that of a credit rating agency, as their scores are based on the customer's history.
Yes, the digital footprint really does represent the here and now. That is probably also the reason why our scores only have a weak correlation with those of the credit scoring agencies – although both are equally precise when it comes to distinguishing between better or worse risks.

Can the digital footprint replace the traditional credit reporting agency at some point?
Probably not. Our paper does show that the two scores complement one another very well. For example, if I have 1,000 customers with an A rating, I can distinguish between those that tend to be better and those that tend to be worse. And if I have customers who get bad rankings from the official credit bureau (Schufa in Germany), I can find out whether some of them are perhaps actually a good risk and have been rated incorrectly.

Are fintechs actually queuing up at your door now to incorporate your findings into their own products?
Yes, there has definitely been a lot of interest.

From financial service providers and banks as well?
Yes, some of them are interested.

But you cannot say more at the moment.
Yes. (laughs)

In a global context you are not the only ones working on digital scoring. The US insurance fintech Lemonade, for example, is collecting data among other things on how much time customers take to read a contract before they click on "accept".
I think that a lot of companies are using something similar. The most prominent example is probably in China, where Alibaba subsidiary Alipay is developing credit scores that are effectively based on behavioral theory models.

Dr. Valentin Burg
is a visiting scholar at Humboldt University, where he has conducted research into the influence of management styles on financial decisions.

Do such approaches comply with the GDPR?
I can't say much about that. You would have to evaluate it on a case-by-case basis. But any company doing something like that naturally has to be transparent about it.

So that the customer knows why he is not being offered certain payment options.
It is also the case that digital scoring can actually work to the customer's advantage if he can use an insecure payment method despite a poor official credit rating. The point is to assess customers more accurately.

When would you advise a company to develop a scoring system based on your model?
It's a question of scale: can you afford it? And do you have enough data to be able to make good assessments? It would need to be in the region of a few thousand observations per month. In such circumstances I would recommend developing a system in-house. Not just because of the better quality of the lending decision but also because you learn even more about the customer.

Study design

Better together

Burg and his colleagues from the Frankfurt School of Finance & Management evaluated 250,000 data points. The ten variables of their model included such factors as device used, time of day the order was made, and typing errors. The results indicated that the digital footprint predicted payment defaults with a probability of 69.6 %, while the credit rating agency scoring was 68.3 %. Both values combined come to 73.6 %.

To learn more go to:
bit.ly/digital-scoring

People at EOS:
And who are you?

The jobs we do are varied, so at EOS we need employees who are unique. We introduce some of them here and tell you who they are, what they do, and what drives them.

Péter Thummerer

Has been working
as Managing Director at
EOS in Hungary since 2003.

Has a particular passion for
angling and regularly goes
fishing with his son.
He also does Kali, a Filipino
martial art, and is a regular
at the shooting range.

"I AM VERY PROUD to belong to this fantastic team. We are successful because we work so well together. In recent years we have increased our headcount from 15 to 280 – a huge growth in numbers. Although I have been here a long time now I never get bored. What I like most about my job is that no day is like another and there are no magic formulas for the solutions we find. I am firmly convinced that you can improve your skills through regular repetition and learning; that's why I do martial arts and sports shooting, because they allow me to improve my concentration and keep fit. Recently I became the President of the Hungarian association of debt collection companies MAKISZ. I believe it is important to establish uniform standards for receivables management in Hungary, so I consult closely with the National Bank of Hungary."

"I LIKE TO RUMMAGE AROUND IN MOUNTAINS OF DATA, because if you look long enough and dig down deep enough, you recognize patterns and underlying trends that can explain a lot. This means that I can use my data to help my co-workers in the team to apply the right strategy when recovering receivables. If it doesn't go as planned, I then analyze the data in the portfolio to see what the problem is. If you base your analysis on the wrong data, you'll get the wrong answer, it's as simple as that. Because I just love working with large volumes of data I am running another project on the side: a computer-aided model that I'm developing together with Center of Analytics to help EOS prioritize collection activities based on their likelihood of success. The goal is to apply the most suitable strategy on the segments we created based on the probability to pay."

Marie-Laure Jacobs

Has been working
as a data analyst at
EOS Aremas in Belgium
since June 2018.

Has a particular passion for
numbers, math and statistics, which she discovered when she was still at school. She completed her Master's Degree in Financial Engineering at the University of Liege.

Julien Sinic

Has been working
at EOS in France for 14 years. He started off in the call center, later he headed the legal department. Since the beginning of 2019 he has been in charge of the Internal Training Department.

Has a particular passion for
music and garage concerts in his home town of Paris. He prefers spending his vacations in places without mass tourism, like Belarus for example, so as to broaden his horizons.

"I LIKE TO LEARN NEW THINGS, and because I work hard, I have always been given a lot of responsibility at EOS. I like that. My job as Head of Internal Training didn't even exist before, so I was able to blaze a trail and try out new things. I have a lot of freedom in how I do my job. What I particularly like is that this enables me to help shape cultural change in the company. I am one of the Culture Companions, that's the international network of colleagues who are driving this change forward in the various national subsidiaries. Everyone at EOS benefits from this and it's a genuine opportunity for the company."

Markus Keller

Has been working
in Building Management and has been at EOS in Hamburg for 18 years.

Has a particular passion for
fishing. Markus can spend hours throwing out a line. He sometimes goes on fishing trips to Denmark or Norway.

"I DON'T LIKE LEAVING THINGS UNDONE. I want people to be able to rely on me. Together with my colleagues I am responsible for distributing files and delivering mail and parcels in-house. I cover 17 kilometers a day, so of course I need comfortable shoes to manage that. It's important to me to get it all done on the same day. My ambition is always to give 100 percent and do my work to the best of my ability. I even got an award for this from my co-workers here in Hamburg; it was totally embarrassing but I am also very proud of it. And seeing that what I do is appreciated by the workforce is what makes my job especially enjoyable."

Stress test in the treasure trove

If you work with sensitive customer data, you need to protect it properly. At EOS Technology Solutions, we conduct regular hacker stress tests to check how secure our virtual defenses are.

Text_Nicholas Brautlecht

I f you talk to Gunnar Woitack about how companies like the EOS Group protect themselves from hacker attacks, then sooner or later the Brothers Grimm come up: "It's like a race between the hare and the hedgehog," says the Chief Information Security Officer at EOS Technology Solutions. "We put up walls to keep attackers out and the hackers develop new techniques for breaking them down."

Since January 2015, Woitack has been in charge of IT security across the entire EOS Group and is therefore something akin to the "Keeper of the Crown Jewels". Just the VWs of this world never let their vehicle technology patents out of their sight, EOS safeguards its most valuable assets, which above all are the data on defaulting payers. Keeping this data safe is absolutely essential to maintain customer confidence. "In Germany alone we store several million datasets," says Woitack. "That's a huge amount for a population of 80 million."

Automated attacks

To ensure the greatest possible protection for the debtor data stored at EOS and its more than 60 companies in 26 countries, Woitack regularly engages professional hackers to scan the virtual defenses of EOS for security loopholes. This year too, these "white hat" hackers will carry out what is known as a "black box penetration test". In the process, the external partner receives several hundred IP addresses from EOS. "This kind of test takes several hours," says Woitack. "And a lot of it is automated."
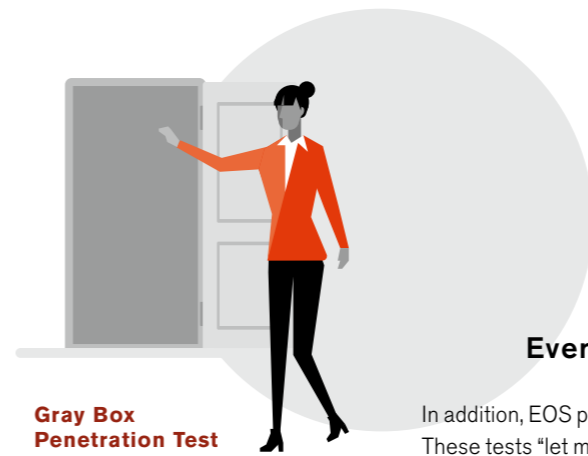
Black Box Penetration Test

What does the hacker do?
In this kind of test the hacker sees the system from the outside and looks for security vulnerabilities using freely available tools or tools he has developed himself. These security gaps might consist of errors in the Firewall setting, for example, directories that are not protected, or security gaps for which no update has been installed.

The black box test is the most realistic simulation. However, real hackers have plenty of time, so a time-limited black box test may fail to uncover certain vulnerabilities.

Penetration tests should be carried out only by trained and certified individuals and companies.

Some good starting points are:
crest-approved.org
eccouncil.org

Gray Box Penetration Test

What does the hacker do?
The gray box test simulates the scenario in which the hacker has overcome the first hurdle and has entered the system. He can now tke his time analyzing the system from within. The hacker's work is made even easier if he also has access to some technical information. Gray box tests are therefore a good tool for getting some quick initial results.

Even the FBI gets hacked

In addition, EOS periodically arranges gray and white box tests. These tests "let more light into the box," explains Woitack. This means that the professional hackers are given access data and/or the source code of web applications. To use the analogy of the hacker as a burglar, he gets the key to the house or even the room layouts and alarm system details.

Although there is no such thing as 100 percent security, EOS still strives to improve its level of protection through these very thorough penetration tests and their constant refinements.

Error rate going down

"As requirements increase, EOS web applications have also become more and more secure over the years. The error rate in the penetration tests is declining and awareness of cyber risks among the workforce is constantly increasing," says Woitack. "The recurring tests steer the focus in the right direction."

The IT expert says that even in 10 years time, simulated hacker attacks will still be an effective means of exposing vulnerabilities. Because the race between the hare and the hedgehog continues. "However, we are working very hard on dealing with it," says Woitack. "We take the risks very seriously and are naturally also investing a lot of money in security."

White Box Penetration Test

What does the hacker do?
The tester analyzes the program code, the system architecture, the hardware used and the selected configurations, examining whether security options have been incorrectly set, insecure passwords chosen or interfaces badly configured.

The white box test can deliver the deepest insights into vulnerabilities in the system, because the testers know the code. However it is very time-consuming because IT systems are complex. The volume of technical information can overwhelm the tester and lead to operational blindness, a failure to see the obvious.

"IT security is like a race between the hare and the hedgehog," says Gunnar Woitack, Chief Information Security Officer at EOS.

How Europe pays

Payment practices are improving
Proportion of on-time payments as percentage of total receivables.

EUROPE 81	WEST 83	EAST 80
2018: 79	2018: 81	2018: 78

Map values:
UK 21 €! · RU 11 €! · DE 14 €! · SK 24 €! · ES 16 €! · BG 23 · GR 23 €!
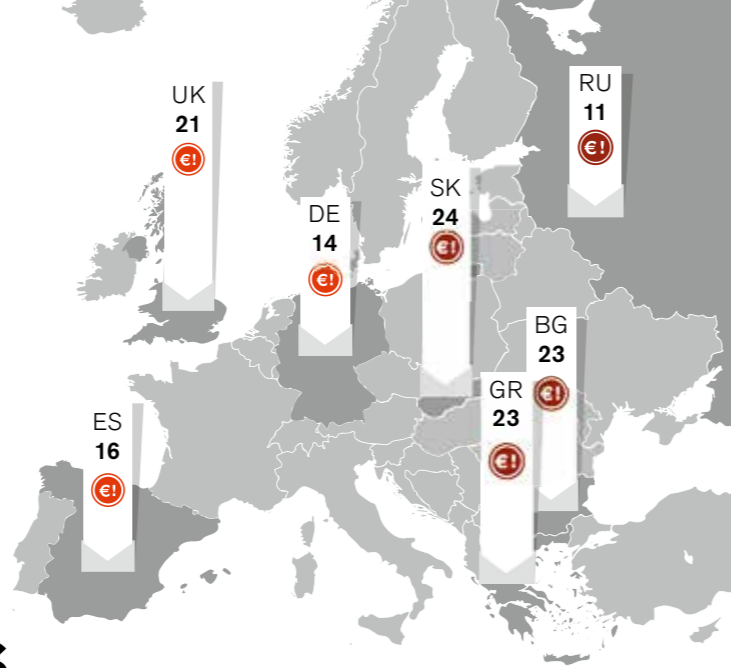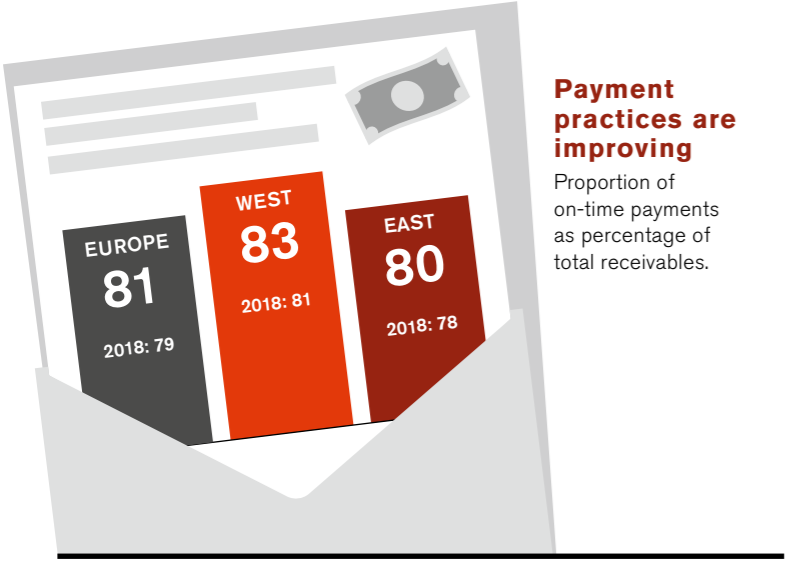
Slovakia and the UK come bottom of the table in Eastern and Western Europe
Proportion of late / unrecoverable payments in selected countries as percentage of total receivables.

How long do European companies have to wait on their money? Why do customers pay their bills late or not at all? What are the consequences for companies – and how do they respond? The EOS Survey "European Payment Practices" 2019 provides the answers.*

What does the future hold? The picture is divided.
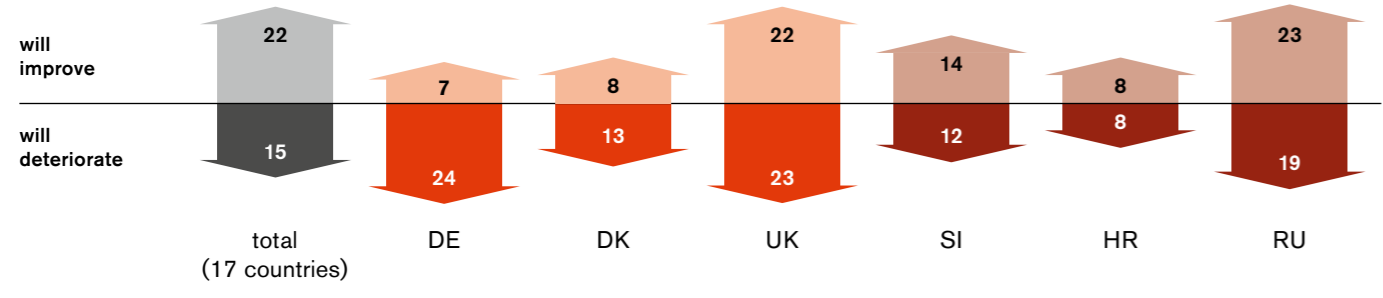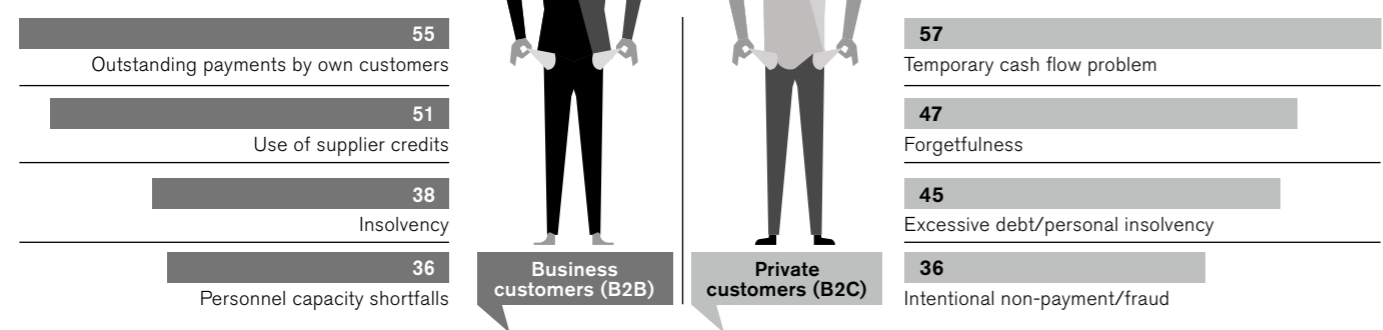Evaluation of trends in payment practices in the next two years; selected countries in Eastern and Western Europe. Overall, 22 % of respondents think that payment practices are going to improve compared with 24 % in the previous year.
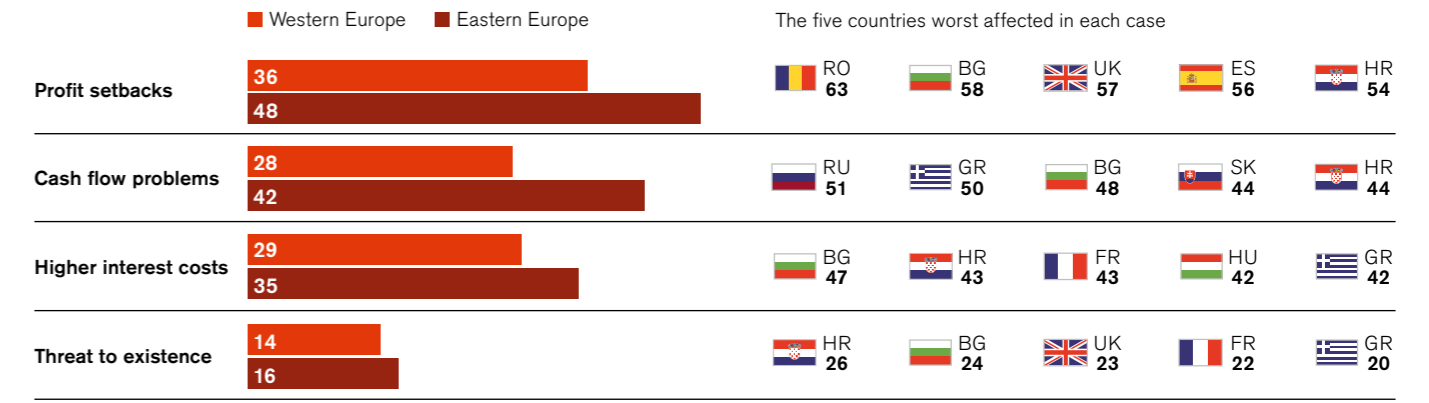
	total (17 countries)	DE	DK	UK	SI	HR	RU
will improve	22	7	8	22	14	8	23
will deteriorate	15	24	13	23	12	8	19

Why has my money not arrived?
The most frequent reasons for late or no payment as a percentage of the responses received.

Business customers (B2B)
- 55 Outstanding payments by own customers
- 51 Use of supplier credits
- 38 Insolvency
- 36 Personnel capacity shortfalls

Private customers (B2C)
- 57 Temporary cash flow problem
- 47 Forgetfulness
- 45 Excessive debt/personal insolvency
- 36 Intentional non-payment/fraud

What payment defaults mean for companies
Percentage of companies affected.

■ Western Europe ■ Eastern Europe

The five countries worst affected in each case

	Western Europe	Eastern Europe					
Profit setbacks	36	48	RO 63	BG 58	UK 57	ES 56	HR 54
Cash flow problems	28	42	RU 51	GR 50	BG 48	SK 44	HR 44
Higher interest costs	29	35	BG 47	HR 43	FR 43	HU 42	GR 42
Threat to existence	14	16	HR 26	BG 24	UK 23	FR 22	GR 20

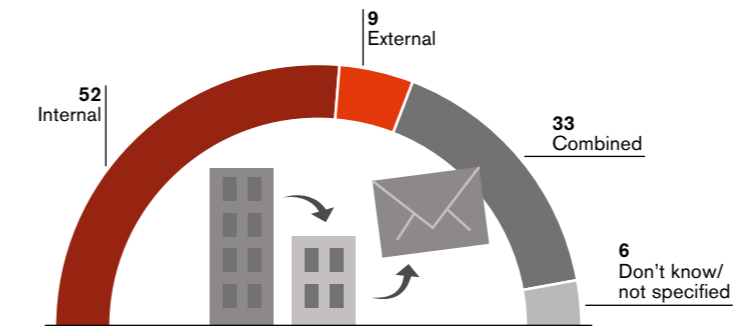Scan this QR code to obtain the entire survey with more results and country-specific statistics.

Debt collection: Do your own or outsource it?
How companies organize their receivables management, as a percentage of responses.

- 52 Internal
- 9 External
- 33 Combined
- 6 Don't know/not specified

4 out of 10
companies rely on working with external service providers to process receivables.

Debt collection recovers lost revenue
Percentage of revenue recovered through working with receivables management service providers.

- FR 7.8
- HU 7.9
- DE 9.8
- RO 5.0
- RU 24.5

*Source: EOS survey of 3,400 financial decision-makers in 17 Western and Eastern European countries; computer-assisted phone interviews conducted March-April 2019.
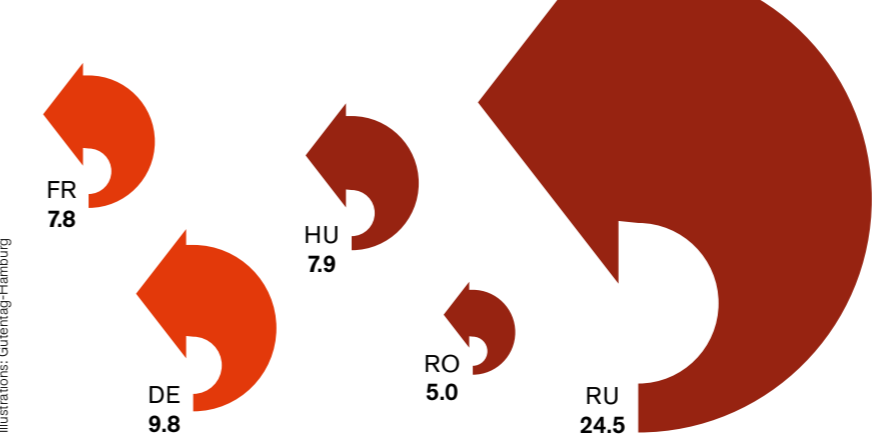
Top 9
Trends in receivables management according to survey
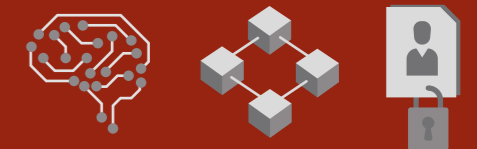
- Measures to improve data protection (52 %)
- Cyber security (49 %)
- Individualization of collection process (45 %)
- Automation of digital communication with customers (43 %)
- Penetration of market by new digital payment solutions like Apple Pay, Google Pay (35 %)
- Artificial intelligence (30 %)
- Trading platforms for receivables purchases (28 %)
- Machine learning (25 %)
- Block chain technology (22 %)

Illustrations: Gutentag-Hamburg

dossier ^{NO} 2

Read here:

- How EOS is implementing agile work practices.
- Why the Board allowed its meetings to be analyzed.
- How cultural change works across borders.
- How co-workers give each other constructive feedback.

All together now!

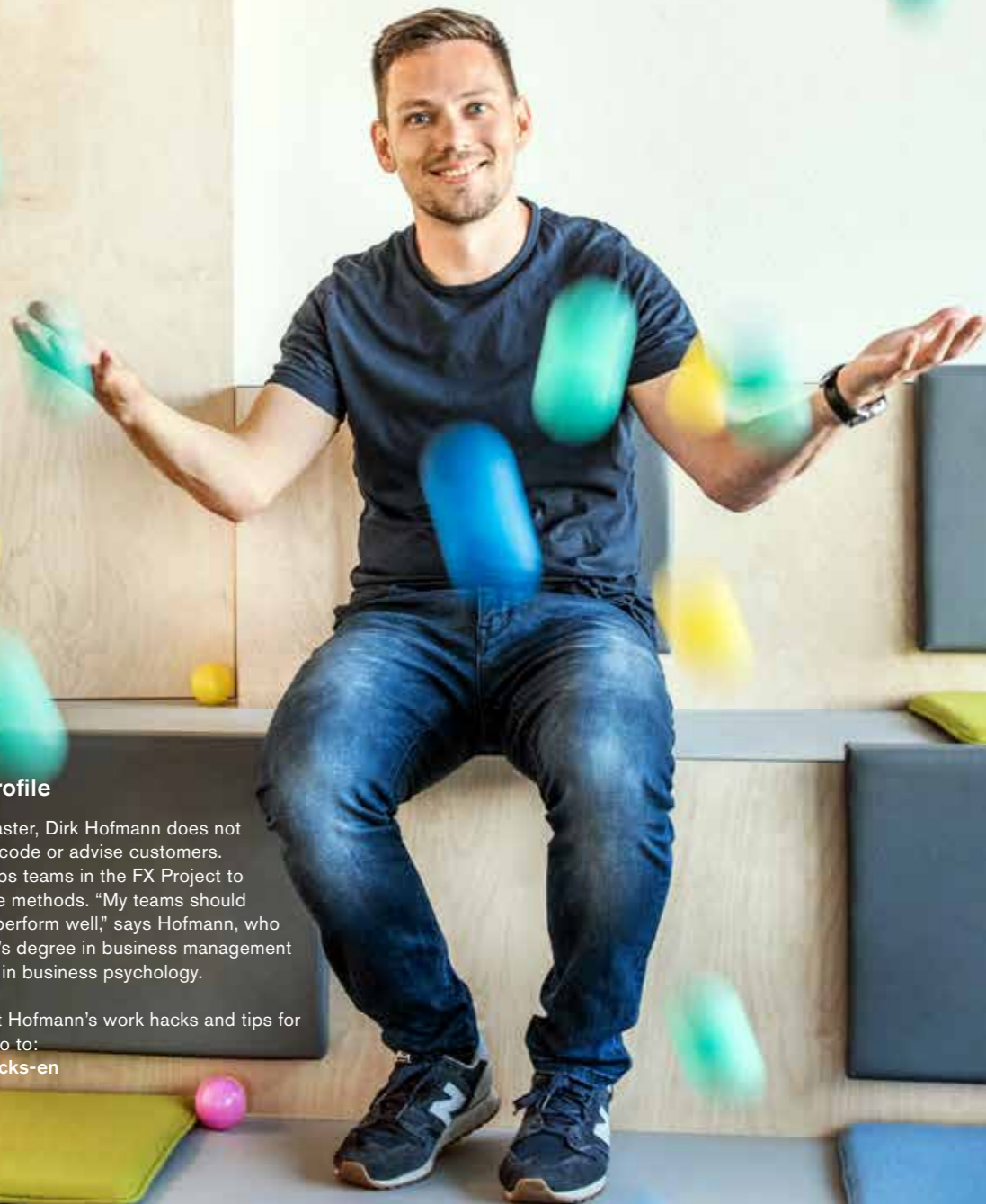To be able to react quickly and flexibly to everything the Internet era throws at us: Sounds like a good idea, but what does it mean in practice? Through the Cultural Journey, EOS employees are working together to develop the itinerary for the digital future.

Text_Nicholas Brautlecht and Catharina König   Illustrations_Joanna Gniady

eos-solutions.com

02_2019

EOS explore

"Agile working is not an end in itself"

For the EOS Group, agile working means being able to respond faster to market changes. Dirk Hofmann, Scrum Master at EOS Technology Solutions, explains what that means in practice.

T en or 20 years ago, the most successful US companies were those with the biggest factories. And today? They are digital service providers like Google, Amazon and Facebook. This reflects the kind of change that EOS and other companies have to adapt to. "You no longer need to have heavy equipment to be successful," says Dirk Hofmann from EOS Technology Solutions. In his capacity as Scrum Master, the 33-year-old helps teams to implement agile work methods.

For Hofmann, agile working – thinking in weeks instead of months and continuously reviewing and adapting development steps – is the only way of responding to this dynamic business and working environment. "Agility is not an end in itself," says Hofmann. "We simply don't know what the market will actually look like in two or three years."

Adopting the customer's perspective
Although the core business of helping people get out of debt remains the same for EOS, the methods have changed, says Hofmann. In addition to traditional "snail mail", consumers also have access to a website where they can communicate with EOS via their smartphones. "Instead of planning things for years in advance, we now listen to what is happening out in the market, adapt ourselves and take smaller steps," says Hofmann.

Nevertheless, a management board cannot simply decide to adopt agile working practices and then impose it on the workforce. It takes time and support to change habitual working methods. Providing support is the job of colleagues like Hofmann, and he does so by using interactive experiences, or to be more precise, games.

To familiarize staff with agile working processes, Hofmann organizes team games like "calculator", where teams have to touch as many numbered cards as possible in the right sequence within a preset time. Each of the

repeated attempts (sprints) is preceded by a two-minute planning session ("How are we going to do this?", "How many cards will we manage?") and followed by a two-minute retrospective (e.g. "What can we do better next time?"). The point is not to learn about the theory of agility but to get started in practice.

Agility doesn't happen overnight
The challenge is carrying over the experiences you have had into your work. "This takes time," says Hofmann. But the games themselves help many people to understand an important principle of agile work practices: the need to autonomously review your own work.

Based on the findings from agile retrospective meetings, teams work out specific improvement proposals for the following weeks. This means that processes are improved continuously. Even more transparency is created through brief, daily stand-up meetings where teams discuss: What's been achieved? Where are there problems? Who can help me?

So much direct discussion also means that team members learn to handle mistakes. "When everything has gone wrong and you have lost two weeks of development – relax!", says Hofmann, "The question is: what do we learn from it?"

Learn how to learn from mistakes
A prerequisite for a fruitful dialog is interacting with one another positively. This includes providing respectful and constructive feedback instead of reproaching people. "We don't grumble and we don't look down on others," says Hofmann. At the same time he admits: "It's a long learning process."

Helping to pave the way as the scrum master, and watching a team develop and improve step-by-step is very fulfilling, says Hofmann. "It is not always harmonious but we do have a fantastic time, because we learn from one another and evolve." Even if agile working methods are not the solution to all problems. "I look forward to going to work every Monday," says Hofmann. "And I hope that everyone else does too!" ∎

Personal profile
As a Scrum Master, Dirk Hofmann does not write software code or advise customers. Instead, he helps teams in the FX Project to implement agile methods. "My teams should be happy and perform well," says Hofmann, who has a bachelor's degree in business management and a master's in business psychology.

For more about Hofmann's work hacks and tips for team training go to:

Photo: Achim Multhaupt

Outside the comfort zone

Wanting to remain flexible and give new direction to its thinking, the Board of the EOS Group allowed a colleague to sit in on its meetings as an observer. After 10 meetings she provided feedback.

> "Our aim is to prepare EOS for the digital transformation and associated changes."
>
> **Jumana Klotsch,**
> **Head of Cultural Transformation**
> **at EOS**

The Board of the EOS Group knew its Monday morning meeting was going to be out of the ordinary because "Feedback for the bosses" was on the agenda. On top of that, guest Jumana Klotsch, a psychologist and the head of the Group's Cultural Transformation Center, had tossed out the usual seating arrangements around the conference table. Klotsch asked CEO Klaus Engberding and his four fellow board members to first sit in an open circle of chairs. A little later, they were asked to turn their chairs round so they were back to back. It may have looked like a breach of rules for successful communication, but was not. Let's back up and explain.

Since 2017, EOS has been implementing cultural change. As one of the world's largest providers of receivables management services, the member of the Otto Group achieved annual revenue of around EUR 800 million in the last fiscal year. Digitalization, however, is changing market conditions and EOS wants to be prepared. Quicker responses to change will be possible if every EOS employee – board members included – can work with greater flexibility and independence and learn from mistakes.

Open to change
Engberding, CFO Justus Hecking-Veltman and the other board members have known each other for 10 years. The current constellation in the executive board has been in place since 2016. "This means that a certain routine has inevitably become established," says Hecking-Veltman, who has been in charge of the company's finances since 2007. The purpose of the experiment was to find out: What processes have we developed? How do we interact? And how does this tie in with an open and courageous corporate culture? Someone looking at the board from outside could help answer these questions. Klotsch, who is in charge of designing the cultural change process, had only been at EOS a few months, so her perspective would be fresh and impartial. Moreover, she had already advised several other companies on the process of digital transformation.

Nevertheless, there was initially some doubt as to whether Klotsch needed to look over the Board's shoulders at no fewer than 10 three-hour meetings. "At first, the expectations were low," Hecking-Veltman admitted later in an interview alongside Board Member Andreas Kropp. Having guests at board meetings is nothing unusual, "but having a colleague sitting there who says nothing through ten meetings really is quite different," says the CFO. The management board was open to the experiment.

Time for self-reflection
Klotsch did not disappoint. On that Monday morning, the Board members sat so they could not see each other. Klotsch read out the prepared text with her observations "word for word", says Kropp. No direct eye contact among management team members. No facial expressions, gestures or anything else that could be interpreted as a reaction to what was being said. Everyone was to concentrate instead only on the words.

Klotsch' observations included sentences like: "I noticed that the agenda items were not prioritized", "… there was no chitchat about the weekend." Or: "so-and-so sat back in his chair". The monologue lasted about 10 to 15 minutes. The meeting then disbanded, with no spontaneous reactions and no cozy little chats. Instead: time for self-reflection. What did I hear? What do I take away for me? "Because it was non-judgmental, the feedback was easy to take", says Kropp, who has been responsible for the German market since the end of 2016.

The courage to have frank and honest discussions
One area where Klotsch triggered momentum in the Board was the culture of debate. "It's one of our greatest challenges," says Hecking-Veltmann. If three out of five colleagues do not share the view of the CEO but nevertheless keep their mouths shut, that is a problem. There ought not to be any "lazy compromises". So we need more substantive discussion and openness to other opinions, that means fewer compromises and less attention to hierarchy. "Our discussions have become livelier."

The Board has also begun to prioritize agenda items more than before. However, the somewhat impersonal approach has been maintained: "Any socializing can take place before the meeting," says Kropp. The Board also shared with Otto its most important insights from the process. These included: Patterns of behavior are not being scrutinized often enough. Self-reflection is hard work, but important! The members of the Board are now also asking for direct feedback from their own teams more often. This might just take the form of a thumbs up or thumbs down gesture. And naturally, it's important for managers to set an example: "If the boss is doing it, then I'll do it too." And the conclusion? "This process was the prod I needed to make me reflect," says Hecking-Veltman. His fellow board member Kropp smiles, recalling his unusual experiences in management training courses, like playing with Lego blocks or creating a pantomime to represent the success of EOS. "Getting out of your comfort zone is something we have already been through." Nevertheless, the process could be recommended to other teams and leadership circles: "Ultimately, we were surprised how much the feedback and resulting reflection on our own behavior helped us to make progress." ■

Jumana Klotsch (right), shown here with Andreas Kropp (left) and Justus Hecking-Veltman, was a silent observer at 10 EOS Group Board meetings.

Photo: EOS

A cultural journey into the future

What is a responsive company? And how does it become one? The EOS Group is facing radical change. Through the Cultural Journey, the company is positioning itself successfully for the future.

How can a strongly positioned company become even more successful? Save more money? Outsource more of its activities? The EOS Group is dealing with these issues and working on its collaboration and leadership culture. This process can be understood as a journey, which is where the term "Cultural Journey" came from. The goal is clearly defined. In an increasingly technology-driven world, EOS should become responsive, that is, respond more quickly to change and not follow trends but set them too. But how does EOS get there, and how far away are we? Jumana Klotsch and the Cultural Transformation Team established in September 2018 have been exploring these questions. To this end they conducted 62 interviews of 90 min-

utes each, around the world, across borders and hierarchies.

Not making bad "good", but making good "even better"
There is a good reason why EOS is successful and there are a lot of things worth keeping. Nevertheless, there's room for improvement if EOS is to meet the requirements of the future. The time for the cultural change has been well chosen. It means that EOS can change from a position of strength, as Julia Rüdiger from the Cultural Transformation Center explains: "The aim of cultural change is business success. Cultural change is not an end in itself; what we are doing is looking at where we could do even better in respect of collaboration and leadership." So it's not

about making bad things good, but about making good things "even better". To find out exactly how to make this work, the team started by examining the status quo. What patterns are preventing EOS from achieving the culture we want? Where can the company carry on as before, and where does it have to become more flexible? The team found four behavioral patterns that are still preventing EOS from being responsive:

- Hierarchy and distance between countries and departments
- Communication culture that needs improving
- Old-fashioned management style and failure of management to present itself as a team
- Lack of space for innovations

Photo: EOS   Illustrations: Shutterstock

New beginnings: the leadership has to exemplify change
The real work of Klotsch and her team is now about to begin, because although the stock-taking exercise is important, it is only the first step towards change. To be able to continue the journey, the International Change Community has to be reinforced, for example. Forty-two "Culture Companions" are already helping management in the countries to drive forward the process of cultural change. According to cultural team member Kerstin Schulz, it is important to start at the top of the hierarchy: "The focus is now on the leadership. Our managers need to set an example and put our heartbeat principles into practice, for example." To stay with the analogy of the journey, this means: If the bosses don't take the first step on the road, then the rest of the workforce will find it hard to follow. Of course, the feedback culture has to change too. The cultural analysis showed that conflicts often are not addressed, and both team members and managers rarely ask for feedback. To find solutions for the future, everyone has to break the outdated rules and behavioral patterns. That's where Klotsch and her team see themselves as internal coaches who accompany this journey. The map is the EOS "heartbeat", the seven principles that define the way people work together, including be courageous, love to learn and share your knowledge.

Cultural analysis for change: Valentina Locci, Julia Rüdiger, Jumana Klotsch, Kerstin Schulz and Janne Boysen (from left) interviewed employees. One of the insights from the Cultural Transformation Team is that there's room for improvement as far as feedback goes.

A journey with a lot of unknowns
With the support of the "Culture Companions", the countries are now being called on to take their own path on the cultural journey. Every EOS company has its own issues and challenges and therefore has to find its own way. And this way is not yet set in stone, because an inherent part of the cultural journey is that there is no clear plan that you can work through to reach the next stage. It is more of an ongoing learning process in which you have to question your own actions. So it's certainly not a comfortable journey, because every team member and every line manager has to work on himself and change some behavior to make the journey successful. Only if everyone takes part in the journey can EOS reach its goal of becoming a responsive company.

Four areas for action on the Cultural Journey
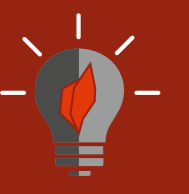
Hierarchy and distance between countries and departments.

Communication culture that needs improvement.

Old-fashioned management style and failure of management to present itself as a team.

Lack of space for innovation.

So how are we doing?

Less hierarchy and more togetherness. To be successful with the process of digital change, EOS is banking on a new feedback culture among colleagues.

Practical example

A card for a colleague

"Hey you, yes I mean you! Are you ready to appreciate the small things in life? Or find the Heartbeat in the day-to-day?" EOS colleagues in Switzerland recently received these kinds of messages on a set of postcards designed to promote a more intensive feedback culture among co-workers. The seven principles of the EOS Heartbeat are noted on the cards:

- Trust
- Walk your talk
- Love to learn
- Strive for excellence
- Embrace change
- Share your knowledge
- Be courageous

The Swiss colleagues using the cards were supposed to think about which of their co-workers or line managers best embodied each of these principles. They were instructed to write a short explanation on the card (e.g. "love to learn: Marek: trained to be a workplace first responder") and put it in the Heartbeat Box. The cards were then distributed to the recipients. A special "barometer" then shows the most frequently issued "Heartbeat value" as a monthly motto.
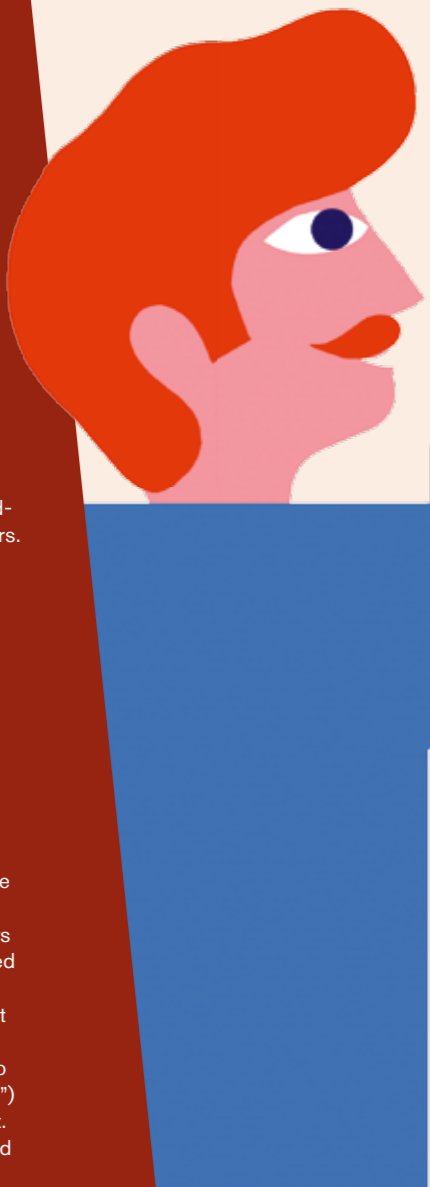
I n Germany, a popular tool for giving constructive feedback is known as the "3W method" as in what's the problem, what's the impact, and what's the solution. Tim Weickert, Managing Director of EOS Technology Solutions (TS), may have been thinking of this process when he approached the HR Department some time ago with the following initiative. It goes roughly like this: My impression is that we can optimize the feedback culture at TS (what's the problem). The status quo is holding us back (what's the impact). Isn't there a software tool that can help us with this (what's the solution)?

Sean Cecilia Walbaum, HR Project Manager at EOS since 2018, welcomed his suggestion with open arms: "One of the key insights from our cultural analysis was that the culture of discussion needs to be improved." Managers and their team members were surveyed over several months on the issue of organizational dynamics and given support in meetings. The conclusion was that the EOS Group needs a feedback culture based on respect and trust if it is to be successful in the long term with the process of digital change.

"The management itself says that it cannot be an expert in every area, which is why we also have to give every employee a voice," says Walbaum. With this in mind, Walbaum worked with her project team to develop a pilot test. Using a software program, the employees of TS were asked to give each other feedback.

Situational feedback

This includes questions like: "What did you like about my presentation?", "How do I inspire you?", or: "Shall we meet up to have a personal chat about your feedback?" This last question shows the purpose of giving feedback via the PC, which is to open the door for direct exchanges. Here the pre-formulated questions can also be helpful.

Feedback from approximately 250 test users showed that it takes too much time to answer a whole questionnaire. "I cannot write down every week how someone inspires me," says Walbaum. Feedback is supposed to be quick. So the decision was made to develop an app in which employees could rate each other with symbols, a bit like on Facebook. For example, thumbs up, good work, then a short

Photos: EOS

Sean Cecilia Walbaum is well aware that you cannot just impose a feedback culture from above.

comment. "That's much more situational." However, the project team quickly realized that it would have to start further back than that and so decided to suspend development of the app.

Because the pilot also showed that the focus was too much on the tool and not on the person. Many colleagues did not understand why they should give each other mutual feedback at all. As a result, the parameters of the project were changed: "Although it's easier to just email everyone and say: 'as of tomorrow we will be giving each other feedback', cultural issues don't work like that." Instead, Walbaum focused on practical exercises.

She traveled all over Germany to hold her workshop. At EOS DID (Deutscher Inkasso-Dienst, Germany), after an introduction (Why feedback? and How do I give meaningful feedback?), Walbaum gave the teams two tasks to do. Firstly, the teams were to work together to conduct two retrospective meetings. This method, which comes from agile software development, helps colleagues to learn from the past and improve future collaboration. Teams that were initially skeptical were pleasantly surprised that issues came up that had not been mentioned previously and were pleased that the problems could be addressed, says Walbaum.

Secondly, Walbaum asked the staff to provide feedback after every meeting for a period of several weeks. And so a routine was established.

Management and team leaders need to set an example with this, says Walbaum. "We can show team members any number of good methods, but if a manager does not encourage them to give feedback, then all the best methods in the world will not help." Whether or not a tool is used, Walbaum is sure that good feedback solves a lot of problems. ∎

Legislative update

What changes have there been to legal frameworks?
What's happening in the EU?
And what regulations are imminent for the industry?
Here are the relevant rulings from the last six months.

Road clear for upload filters?

EU copyright law reform adopted

THE "COPYRIGHT in the digital single market" directive is a done deal. In April, the EU member states agreed to the much discussed EU Directive intended to regulate the exceptions and limitations of copyright law and other property rights associated with the licensing process. Publishers will now have more rights for the online use of their publications and authors will be entitled to a regulated fee. It is still permissible to use work for the purposes of quotation, criticism, review, caricature, parody or pastiches. Other aspects covered are the protected utilization of works and out-of-print works, the issuing of extended collective licenses and the acquisition of rights to films by video platforms like YouTube. As of now there will be more precise rules for online file-sharing networks and the content uploaded by users, so that copyright holders can make better decisions about the utilization of their online works. There are exceptions for the online dissemination of cultural heritage, text and data mining, and online teaching activities. Major changes apply to online platforms that will have to protect their user-generated content in future, for example through upload filters.

Directive (EU) 2019/790
bit.ly/eu_copyright

Sales of goods

EU extends consumer protections internationally and digitally

THE TRADE IN GOODS and digital content across borders is set to be made easier and more secure. To better protect consumers – and companies – the EU Council adopted a comprehensive package of directives on April 15, 2019. The purpose of the "Sales of Goods Directive" is to provide more legal protections for cross-border purchases. At the same time, the law will simplify EU-wide sales of goods for SMEs in particular.

The "Digital Content Directive" provides a high level of legal protection to consumers shopping online, particularly with regard to the payment process and the associated data provided. The new legislation will also simplify the complaints process. If it is not possible to fix defects within a reasonable amount of time, the consumer will be entitled to a price reduction or even full reimbursement within the guarantee period of two years. This applies to all goods including products with digital components like smart fridges.

Directive EU 2019/771
bit.ly/trade_safety

Reducing bad loans

New capital requirements for banks with NPLss

FOR A LONG TIME, the European Central Bank (ECB) has been pushing banks to reduce their NPLs – and above all to prevent them from accumulating again in the future. Support is now on hand in the form of a new regulation from the EU Council: As soon as new loans become distressed, banks now have to ensure that they have sufficient reserves. Another new feature is a common definition of NPLs, intended to ensure that the latest rules lead to a "prudential backstop", a common minimum loss coverage for the amount of money banks need to set aside to cover losses caused by future NPLs. Different coverage requirements will apply depending on whether the NPLs are classified as "unsecured" or "secured" and whether the collateral is movable or immovable. NPLs will remain backstop-free for a period of two years. In the third year, the banks will have to provide 100% coverage for unsecured loans. Bank-friendly exceptions apply if the NPLs are secured by real estate. In this case, banks have a total of nine years to gradually build up their reserves.

Regulation EU PE-CONS 2/19
bit.ly/badloans_bank

After Brexit

Visa-free travel to continue in the future

EVEN AFTER BRITAIN leaves the EU, it will still be possible to travel to the country without a visa. And Britons will also be able to visit the EU without a visa. This applies to short stays of maximum 90 days within a 180-day period.

The British won't be able to change their minds that soon. This will be ensured by the principle of reciprocity alone, according to which all parties have to abide by the visa-free travel regulations. The European Commission would inform the European Parliament and European Council directly about all developments that could jeopardize this mutually agreed principle. If the British government were to suddenly act differently, the three EU institutions and member states would also take action.

Directve EU 2018/1806
bit.ly/nodeal_travel-en

Cyber security

EU has online scammers in its sights

IN 2013, the volume of fraud in the then 32 European states making up the Single Euro Payments Area stood at € 1.44 billion. Today, around 36 billion phishing messages are being sent every year. It's reason enough to declare war on cyber criminals within the EU. One of the weapons is the "Directive on combating fraud and counterfeiting of non-cash means of payment", which was adopted in April. The updated regulations include common definitions of specific online crimes like hacking and phishing. In future, if a judge imposes the national maximum custodial sentence for fraud in non-cash payment transactions, the offender will be looking at a minimum sentence of three to five years, depending on the punishable offense. In addition, the legislation will make it easier to prosecute cross-border fraud cases. An important aspect in this context is the regulation of jurisdiction.

Member states are free to adopt stricter rules that go beyond the minimum requirements of the Directive. The new directive therefore provides a clear-cut, sound and technologically neutral legal framework and fewer operational impediments to investigations and prosecution.

Directive 2017/0226 (COD)
bit.ly/noncash_fraud

Scaling new heights in A Coruña

With its beautiful beaches and interesting sights, the capital city of the autonomous region of Galicia is quietly blossoming into a popular holiday destination. The northern Spanish city also offers ideal working facilities for business travelers.

A Coruña

01
Ascensor panorámico
Av. Fernando Suárez Gracia

06 Bar Atlántico 57
Av. Buenos Aires 1

05 Galerías de A Coruña
Av. Porto de Coruña

04
Restaurant Samaná
Rúa Rosalía de Castro 9

02
Coworking Space
„The Apartment"
Rúa Santiago de la Iglesia 6

03
Hotel Plaza
Av. Santiago Rey
Fernández Latorre 45

Business-Trip
No. 2

A Coruña
Tips for a successful stay in the "City of Glass" on the Spanish Atlantic coast

48

01

Ascensor panorámico

To get your first impressions of the city a trip on the "Ascensor panorámico" is ideal. The glass ball on rails takes you to the top of Monte de San Pedro, from where you will enjoy beautiful views (open 15 June – 15 Sep. Tue. – Sun. 11.30 a.m. – 9 p.m., the rest of the year Sat. + Sun. 11 a.m. – 7.30 p.m., ticket € 3, turismocoruna.com).

02

Coworking Space "The Apartment"

The co-working space "The Apartment" is equipped with everything a business traveler desires. We mean WiFi, projectors and so on, but also a decidedly creative working environment where the local start-up and freelancer scene gathers with "co-workers" from all around the world (open Mon. – Fri. 8 a.m. – 8 p.m., rate for one day, € 12, theapartmentcoworking.com).

Arrival

A Coruña's "Aeropuerto de Alvedro" is only eight kilometers south of the city, so it takes just 15 minutes to get to the center by taxi. If you have an hour or so between checking into your hotel and your first meeting, you should use it for an excursion to Monte de San Pedro. You can comfortably reach the hilltop park from the Av. Fernando Suárez Gracía, which hugs the shoreline, by taking the "Ascensor panorámico", a ball-shaped elevator made entirely of glass that offers visitors magnificent panoramic views of the Atlantic coast off A Coruña as it climbs to a height of 100 meters.

Switch off and relax

You'll need to allow a bit more time if you want to join one of the free walking tours organized by the tourist office. These tours are led by guides dressed as historical figures from the city's past. They include the director of the School of Fine Arts where Pablo Picasso once attended classes and the butcher's brave wife María Pita, whose heroism helped defend the city from an attack by the English fleet in 1589. The **90-minute** free tours start at the main entrance to the town hall on "Praza de María Pita" square and take you all over the old city, the "Cidade Vella" (for times and registration go to: visitasguiadas.coruna.es).

Of course you can also take a look around the area on your own. The old city is located in the east of the peninsula and can be explored easily on foot. If you take a stroll through the narrow cobbled streets, you feel you are being taken back to the Middle Ages. Would you prefer some exercise instead? Not a problem! Between the Riazor and Orzán beaches in the heart of the city are three kilometers of fine sand ideal for joggers. Art lovers should head for the museum of fine arts (Museo de Belas Artes). The 5,000 exhibits include works by famous old masters like Goya and Velázquez (open Tue. – Fri. 10 a.m. – 8 p.m., Sat. 10 a.m. – 2 p.m. + 4.30 p.m. – 8 p.m., Sun. 10 a.m. – 2 p.m., entry around € 2, Rúa Zalaeta 2). →

49

Dining out

The **two-hour** guided tapas tours by "Tour in Galicia" (ticket € 65, www.touringalicia.com) are perfect for foodies, who get to explore the culinary delights of the "Cidade Vella". And while we're on the subject of tasty delights, you are sure to be impressed by the Galician cuisine, which is dominated by fish and shell-fish. One local specialty is "Arroz con carabi-neros y zamburiñas" – a creamy rice dish with scallops and deepwater prawns. The quaint restaurant "Celeiro" specializes in traditional dishes (open Mon. – Sat. 12.30 a.m. – 4 p.m. + 8 p.m. – midnight, Sun. 12.30 a.m. – 4 p.m. only, Rúa Franja 14, restauranteceleiro.es).

The stylish "Samaná" fusion restaurant is ideal for a business dinner in a sophisticated atmosphere. Steaks, freshly caught grilled fish and seafood, Thai-style wok dishes and South American classics like ceviche are served on elegant table settings (main courses from around € 18, open Mon. – Thu. 10.30 a.m. – 2 a.m., Fri. 10.30 a.m. – 2.30 p.m., Sat. 12 a.m. – 2.30 p.m., Sun. 12 a.m. – 1 a.m., Rúa Rosalía de Castro 9, samanacoruna.com).

Accommodation

One of the best hotels for business travelers is the recently renovated **Plaza Hotel**. It is located in the chic inner-city district of Los Castros right next to the harbor and offers 94 comfortable, nicely furnished rooms. Guests have free access to the hotel's own business center, and conference rooms of various sizes can be rented if required. In addition, there is free WLAN with high-speed internet, an airport shuttle, a well-equipped gym and a spa with pool and Turkish bath. ■

03
Hotel Plaza
This 4-star hotel offers a central location, modern rooms and a lovely roof terrace. (single rooms from around € 89, hotelplaza.es).

04
Restaurant Samaná
It's said that food should be a feast for the eyes too. And that's obviously what the owners of the chic "Semaná" restaurant had in mind. The trendy restaurant wins accolades for its food and outstanding interior design.

Useful apps

Spanish-English Business Dictionary: Reading Spanish emails or presentations is no problem with this app, because it contains the technical vocabulary of business and law.

Axenda Cultura Xunta de Galicia: Comprehensive events calendar for Galicia in English.

TaxiClick: One of the best-known taxi apps in Spain offering a reliable service.

My A Coruña
Connie Neira, Cultural Change Facilitator at EOS in Spain, recommends that visitors take a trip to the "Cidade Vella" (old town) of A Coruña. The major attractions include the majestic square "Praza de María Pita" with the beautiful turn-of-the-century "Casa do Concello" (town hall), and the 13th century collegiate church "Santa María del Campo". According to Connie Neira, an excursion to the 68 meter high "Torre de Hércules" (Tower of Hercules) is a must. The tower, a UNESCO World Heritage Site, was built by the Romans in the 2nd century and is regarded as the world's oldest lighthouse still in use today. If you manage to climb the 242 steps to its viewing platform, you are rewarded with beautiful views over the town and the coast off A Coruña.

Photos: Miriam Barral, Hotel Plaza (2), MAS Arquitectura, Atlántico 57 (2), PR (3)

05
Galerías de A Coruña
If you take a stroll along the harborfront you will see the famous "Galerías de A Coruña" – tall white residential buildings up to eight stories high with glass-enclosed balconies known as "galerías". When these glazed balconies sparkle in the sunlight it is easy to understand why A Coruña is nicknamed the "City of Glass".

06
Bar Atlántico 57
In the mood for a sundowner after work? Then the stylish "Bar Atlántico 57" is the perfect venue to enjoy drinks with a view of the sea (Av. Buenos Aires 1, 57baratlantico.com).

Let's take a closer look at that

What innovation potential is lurking in our data? What opportunities and fields of activity does it open to us? The new EOS data strategy is designed to provide the answers. In a complex process, the value of each data point is determined and this information is made transparent to all employees.

Text_Gerrit Wiesmann

"For an e-commerce group, data are like fuel."

**Sebastian Klauke,
Chief Digital Officer
of Otto Group**

The mantra "data are the new oil" has turned into just another a platitude. Another hackneyed expression is the claim of being a "data-driven" company. It's easy enough to say but hard to define and substantiate. With this in mind, Otto Group, which includes EOS, has established its own Business Intelligence Unit. However, every company has to determine the value of its own data.

"Our most important asset is the data we have and use every day," says Sebastian Klauke, who is responsible for e-commerce, technology, business intelligence and corporate ventures in the Otto Board. "For an e-commerce company like Otto Group data are like fuel."

That's not a simple simile. The Otto Group actually needs this fuel to survive in the new world of multi-channel retailing. "The customer wants an extensive range of products and fast and reliable delivery times," says Klauke. "The only way to achieve this is with data."

A new perspective on things
At EOS the fuel analogy is being further and developed into a new data strategy. The basic idea: "If data, like oil, are worth something, then you ought to be able to attribute a value to it, just like oil," says Henning Stolze from the Data Governance Office at EOS Deutscher Inkasso-Dienst, in Germany. "Based on this concept, EOS analyzed the euro value of its most important data and constructed a new management system based on those figures."

The idea came up in a series of management workshops on the handling of data at EOS. "We wanted to do more than just affirm that we are a 'data-driven company'," says Stolze. "We wanted to develop specific mea-

sures." Measures that give employees a deeper understanding of the importance of the data they are working with.

However, it emerged that it is easier to determine the worth of oil than to put a price on the data held by a debt collection company. "Take the cell phone number of a defaulting payer," says Stolze. "Even in the case of a simple data point like this there are three perspectives: We paid an investigation service for this number. We have ongoing costs for data maintenance. In addition, behind this telephone number is the value of an outstanding receivable."

Moving away from "knowledge as power"
For Stolze, it is essential to bring these perspectives together, because this shows employees that what they might consider a rather unimportant piece of data can be valuable to other departments. "This is the cornerstone of our strategy: if I know that something has a value then I will handle it more carefully and protect it better. This attitude to data will change the corporate culture." The data strategy is designed not just to make clear to employees at all levels and in

all areas what their data is worth, but also how they can handle it efficiently and in compliance with the relevant legislation. Because items of great value also need to be well protected from attacks. "Alongside the process mindset, we also always have to concentrate on the data element," says Stolze's colleague Jens Koch-Bodes: With the help of the new strategy, EOS can scale up its business without silos, stand-alone solutions, historical baggage or knowledge-as-power attitudes thwarting the processes.

Long-term strategy
The key tool in this context is the Data Dictionary, a company-wide directory that shows clearly, for every type of information, the value of this data point and the departments responsible for it. All data streams are intended to be traceable throughout the entire company, says Stolze: "You will see at a glance how data from the operating system are being used in call center management and ultimately summarized with other data to produce a key indicator in the standard reporting."

But the Data Governance Office is taking this idea a step further. Perhaps in three years, values for the data they are currently working with will be continuously displayed to employees in the debt collection software. In addition to somewhat short-term revenue data, companies will receive KPIs for the long-term trend in the overall value of all data. "This allows business management based on a new, much longer-term perspective," says Stolze.

And this fits in with the approach of the Otto Group. Neither the parent company nor EOS is fundamentally concerned with short-term profit maximization, says Klauke: "We want sustainable success without abandoning our value framework."

Work culture

"Quiet please!"

Ping, ping, ping – the sound of email and calendar messages is a symphony to the death of productivity. Many firms ignore the key findings from research into brain function and work environment, even though it is not really that difficult to slow down the hectic pace.

Text_Georg Dahm

Please go outside to talk: libraries set a good example for office rules.

How often do you hear someone saying (usually around 6 p.m.): "Finally I can get some work done!"? If your answer is "never" then congratulations! As for all the rest: you are not alone. Many people confuse productivity with hectic activity and think that the consequences are unavoidable.

The good news is that this is not true. The question "Did you see my email?" can explain what is going wrong at many companies. Every time this question is tossed out there quickly in a phone call or in the corridor it destroys valuable time. There are three reasons for this.

■ **No context:** Which email does he or she mean, after all I get so many emails?
■ **Interruption:** I was just dealing with something quite different – thanks for nothing, now my brain is going to take several minutes to refocus again.
■ **Personal whims:** why ask that question now? There is no objective reason – the colleague concerned was just in a chatty mood at an inappropriate time.

Interruption, whims, no context: all come up in your working day when coworkers have little regard for other people's time. It might take the form of the meeting that pops up in your calendar in the morning just when you wanted to keep your head clear for writing a draft. Or in the forwarded "Re:Re:Re:Re" email conversation with the rudimentary instruction: "See what we can do here." Or in the collective panic that occurs when no one knows which version of an important document is the latest one.

Talking is better than emailing

It's on these kinds of days that you really don't get to work properly until around 6 p.m. These examples can provide us with a healthier work culture.

The first step is to use every communication channel sensibly. Email is good for letters to the outside world, but not ideal for working together on drafts or for fast-paced internal communication. For these purposes, group chat and messaging systems are better, because they bundle conversations in a clearly presented way and ensure that important in-

formation doesn't get lost among hundreds of emails. As soon as confusion arises ("what does he actually want from me?"): don't write, but talk, especially with customers. A phone call clears things up faster.

The second step is to keep all information about a project in one place. Obviously, you have a server where all files are stored, in theory at least. But in practice, there are a lot of laptops with various versions of Word and Excel files that have been emailed back and forth several times. Use systems where all participants work on the same document online and can discuss it in one place. An up-to-date version of Microsoft Office already does this.

The third step is to respect the brain's performance curve. Most people can concentrate best in the mornings, working on a task a couple of hours at a time. Make the most of this time and don't arrange any meetings or appointments during it. Protect these hours with "library rules". Just like in a library, nobody is to disturb the person next to him and talking is to be done outside or later. As for your email? I'll read it later. After all, it's rarely a matter of life and death. ■

Useful reading material

There is another way

2

Staying sane

It's not the end of the world when we say "no", for example to jobs that will take us to the brink of madness. Jason Fried's practical guide **"It Doesn't Have to Be Crazy at Work"** is a reckoning with business practices that are easier to replace than we think.

1

Focus

So what's all this really about? In **"Less"**, Zen priest, coach and start-up founder Marc Lesser explains how we get more done by not making ourselves and everyone else crazy.

Re-energize

After a 14-hour day you might not feel like reading about the many little naps and long walks taken by famous thinkers, sporting personalities and heads of government. But you should. In **"Rest"**, Alex Soojung-Kim Pang shows why resting properly is a skill that everyone should cultivate.

3

Collaboration apps

Better than email

What is happening when and how?

Zenkit.com can turn Excel tables into interactive project schedules with calendar and messenger functions, Kanban board and access rights for team members and external participants. The tool is hosted in the EU.

Faster and better structured.

For internal communication, group chat and messaging software are often more efficient than email. If you are not keen on the market leaders Slack.com or Microsoft Teams, you could try alternatives like Twist.com or Mattermost.com.

Search less and find more.

A dashboard for the whole team: systems like Asana.com, Stackfield.com or Microsoft Teams keep deadlines, tasks, files and discussions under control. It's very easy to get started with Basecamp.com.
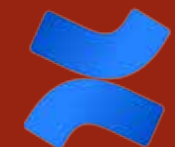
Is that the latest version?

Google Docs or Microsoft Office allows teams to work on documents together instead of constantly emailing new versions back and forth. Alternatives offering more functions are the user-friendly Quip.com or Confluence (atlassian.com), which firms can also host themselves.

"My main concern is my smartphone,

because no matter how often I check it and use it, it can always get lost or stolen. Luckily, a lot of devices nowadays can use biometric information for security. I use this function whenever possible, for example to make payments online or to unlock my smartphone. I also try to make my passwords as strong and complicated as possible. Many people believe that combinations consisting only of numbers are the most secure passwords, but the variations are highly limited."

Bence Bíró (23),
Software Development Assistant,
EOS Hungary

Data security affects everyone

Our young people know that they need to be circumspect not only with customer data but with their own as well.

"Personalized advertising follows us everywhere,

even if you switch it off it pops up on your social media feed shortly afterwards again. In the meanwhile I have accepted that I can't prevent it anymore and that I am repeatedly going to be shown these ads on YouTube and Google. I try to share as little information about myself as possible online. Internet security is an interesting subject and will continue to be an issue for us in the future. It is frustrating to know which information the major tech firms already have about us and that they keep on collecting."

Vivien Fekete (24),
Case Analyst Associate,
EOS Hungary

"Data security is an important issue for all

who use social media, buy things online or play online games. We should protect our private sphere properly and exercise caution when using websites. I am very careful with my data and try to reveal as little as possible about myself when I am online, even if it is of course sometimes necessary to provide your details, e.g. when shopping online. On social media sites I enter only my name, schools and date of birth, so that old friends can find me. But I would never share my phone number and my privacy settings are always set to private."

Tamás Horváth (25),
Senior Administrator,
EOS Hungary

"I should be using encrypted browsers,

and I totally understand people who only use these platforms to surf the net. It's a creepy feeling knowing that every word we type into Google then ends up as advertising targeted at us. Another question is whether you should use GPS-based maps or not. But when is the last time you saw a tourist on the street with a paper map? Except for my parents perhaps, who rely solely on paper maps because a few times the GPS sent them in the wrong direction – resulting in some good stories to be told at family gatherings."

Polla Zsuzsa Nyerges (23),
Human Resources Assistant Receptionist,
EOS Hungary

Ready to learn something new?

EOS turns 20!
March 1, 2020
We're celebrating our anniversary

Investments, coding, finances and more: keep up-to-date with these interesting workshops and events held over the next six months.

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2020

25–27 September
FENCA European Collecting Congress

PT – Lisbon | The Federation of European National Collection Associations FENCA invites you to get the latest information on topics such as the relationship between "consumer and collector", European collection methods and technological developments.
fenca.eu

26–27 September
TSI (True Sale International) Congress

DE – BERLIN | EOS will be part of the TSI Congress "ABS Reloaded – the Opportunities of STS in Troubled Times". Representing EOS on the panel: Sebastian Pollmer, Head of Secured Portfolio Valuation, on standardized and transparent securitization (STS).
tsi-kongress.de/en/

1–2 October
Global NPL

UK – London | At this two-day conference, investors, originators and financial service providers from all over the world will discuss "Exploring Investment Opportunities in the Global Distressed Market".
bit.ly/Global-NPL

17–18 October
Europe-Asia NPL Summit 2019

GR – ATHENS | The gathering for the who's who of the distressed debt environment: The event will feature banks, private equity, associated players and companies from the receivables management sector, including Philipp Schuemann, Carsten Tidow and Karel Smerak from EOS.
ddc-financial.com

24–25 October
code.talks Hamburg

DE – HAMBURG | Attracting 1,500 participants, this is Germany's biggest developer conference. New talks every hour in 15 different tracks provide a wealth of professional expertise.
codetalks.de

18–22 November
Euro Finance Week

DE – FRANKFURT AM MAIN | In 2019, the largest industry gathering for the financial and insurance sector in Europe will be focusing on issues like governance, risk and compliance processes and artificial intelligence in the finance and banking industry.
dfv-eurofinance.com

28–29 November
NPL Iberia

ES – MADRID | The global distressed debt market meets regularly to discuss non-performing loans (NPLs) – this time the venue is Madrid. EOS Spain will also be represented at this event.
bit.ly/NPL-Iberia

11–13 February
13th Annual Banking Credit Risk Management Summit

A – VIENNA | Experts from the best banks in Europe will discuss stress tests, the Basel III regulations and current challenges in credit risk management.
bit.ly/BCRM-Summit

March 2020
NPL Europe 2020

GB – LONDON | At NPL Europe 2020 you can look forward to the latest news on the global distressed debt market and enjoy excellent networking opportunities.
smithnovak.com/events

eos-solutions.com

EOS explore   02_2019

58

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