

THE COMPLETE GUIDE TO DETECTING FRAUD AND EARLY DEFAULTS VIA ALTERNATIVE DATA



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Part 1

Introduction

Alternative data has become a buzzword in recent years, with the increased use of alternative sources of information within the banking and fintech world. Nevertheless, given the novelty of this dataset, there is a general misunderstanding of what alternative data is and how companies can leverage this power tool for continued growth.



In the last ten years, financial companies have searched for reliable sources of consumer information and their behaviours. **The constant evolution of digital technology brings about a great advantage never formally registered before - analysing people's digital behaviours.**

Alternative data

provides a revolutionary understanding of creditworthiness

opens up a new set of credit models that can accurately rate people, using more than just traditional methods.

Using alternative data arises from the need to serve thin-file customers, forming the majority of under and unbanked potential borrowers in emerging markets.

Part 1

Unlike traditional data, this advanced underwriting assessment model includes new data sources related to people's behaviours, such as

rental payment and subscriptions

social networks' behaviours

emails

financial reports

geolocation



The rapid generation of alternative data from improved artificial intelligence models has introduced a great **new opportunity to improve profits in the market.**

Thanks to **alternative data and machine learning**, companies gain a fascinating advantage: **access to valuable information about current and future customers' behaviour, allowing companies to grow rapidly.**

In **this ebook**, you will uncover what alternative data is and, more specifically, how certain tools, such as **behavioural data** can help your business grow by tapping into new unexplored market segments.



What is Behavioural Data?

Behavioural data is the set of information on behaviours, habits, interests and transactions carried out by a person and obtained from non-traditional sources.



Behavioural data has grown rapidly in recent years, given the improved sophistication of machine learning and the availability of big data. **The growth of behavioural data is exponential, powered by the fact that more and more users are storing information on the network, generating new data every day.**

The correct use of behavioural data through machine learning gives companies a fascinating advantage; access to valuable information about current and future customers' behaviour allows companies to grow rapidly.

Nevertheless, its advantages come along with several challenges, and only some companies have been able to incorporate this type of data.



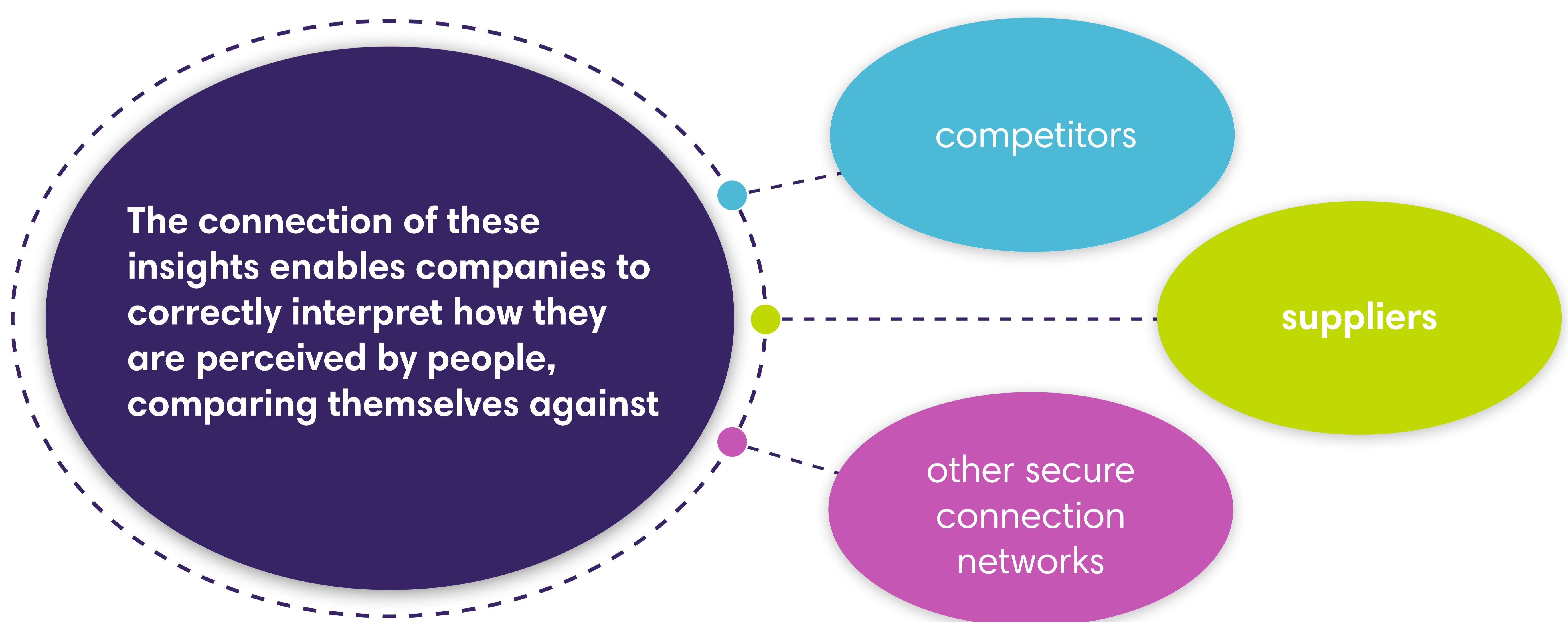
Benefits and Challenges of Behavioural Data

Benefits of Behavioural Data

In the first place, it is important to note that, thanks to behavioural data, companies can **compare and measure information in real time**, generating truly innovative indicators. In this way, applicants can be assessed on the spot with accurate real-time underwriting with end-to-end security.

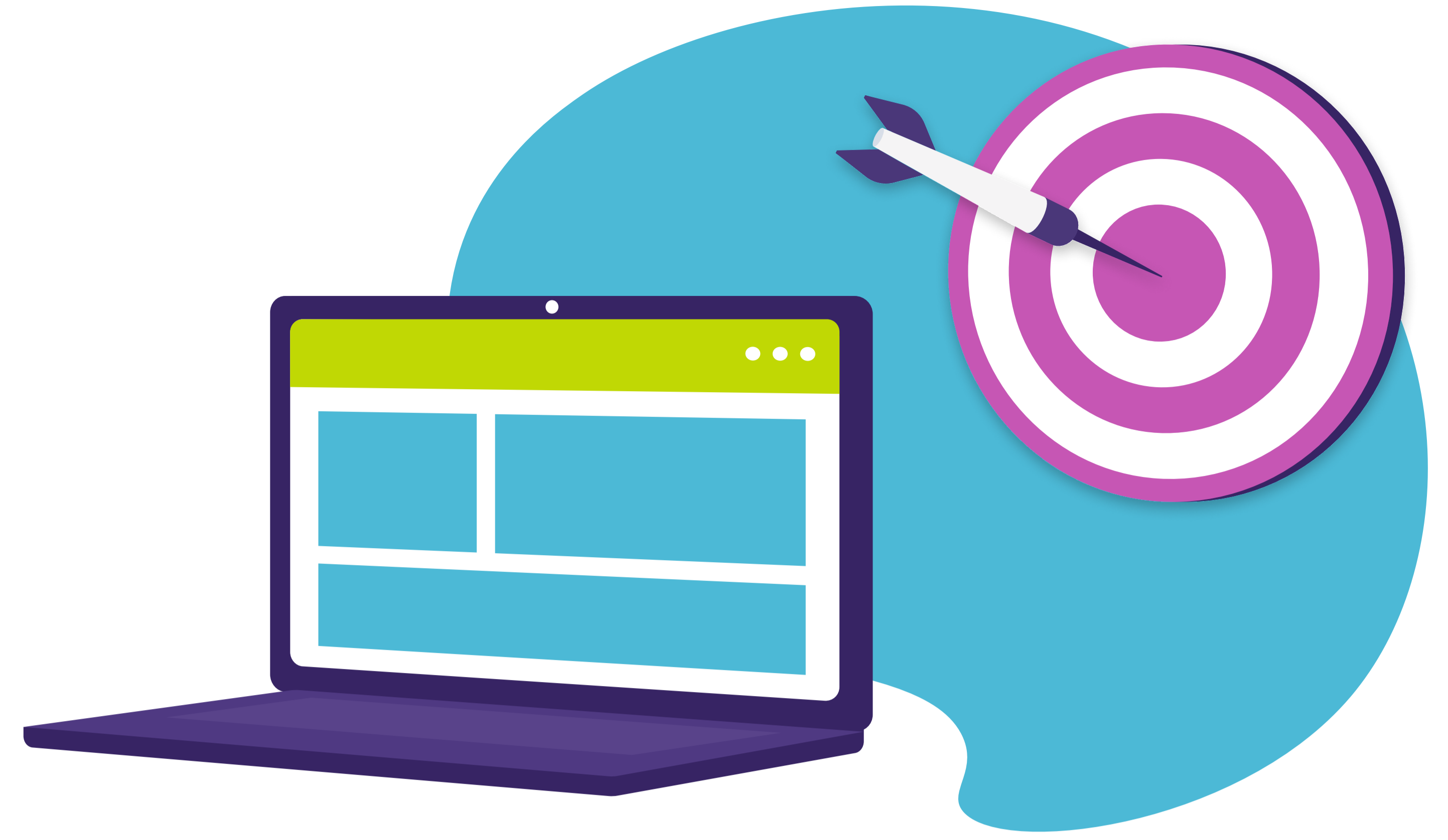


Behavioural data **improves the self-knowledge of a company**. A large amount of existing behavioural data allows institutions to have a more accurate perception of their performance.



Part 3

Another important benefit to consider is the capacity to **operate predictively using behavioural data**. Companies can predict long-term results more reliably through this novel source of information and in conjunction with traditional sources.



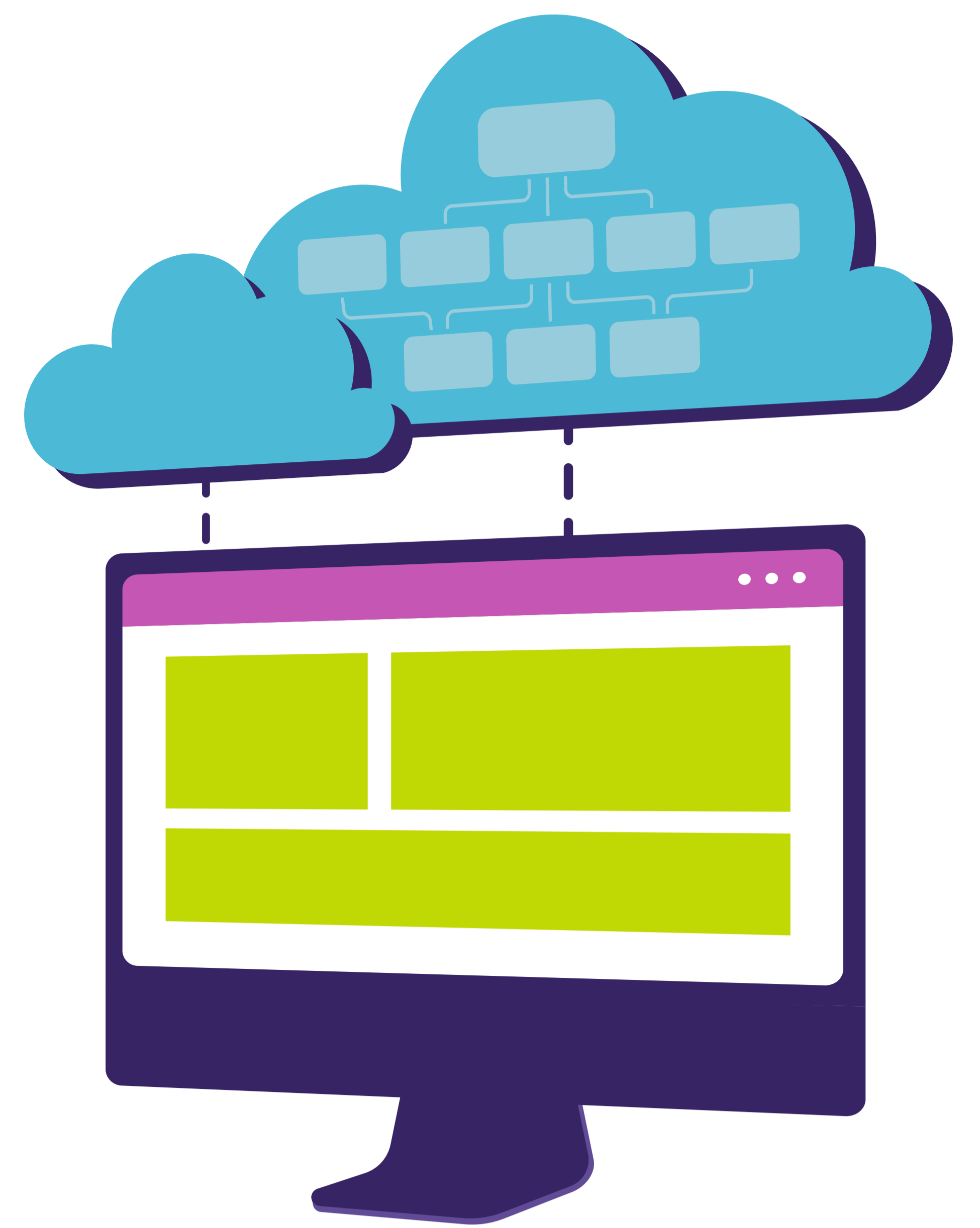
In addition, this new source of data provides security, offering businesses more than just big data.

Part 3

Challenges of Behavioural Data

Behavioural data is relatively new, so it can raise several questions at first glance. There is a lack of historical records, plus not all behavioural data is publicly accessible. Therefore, it is essential to accurately understand **where information is coming from** and the limitations of its usage.

Currently, there is a **wide variety of behavioural data sources**, so companies must organise them and clearly distinguish between those most relevant for the business. Furthermore, as there is no standard pattern of use, it is of utmost importance to understand how they work holistically and completely with all sources of information.



Added to this scenario, companies face the challenge of **data interpretation**. With a wide variety of sources, it can be challenging to distinguish and judge the quality of each source to choose the correct one. Any corruption of this data can result in incorrect decision-making and cause great harm to the company.

Another important aspect to be considered is the accurate knowledge of the private legal terms of each source.

This knowledge includes

limitations of the implementation

understanding where the information is coming from

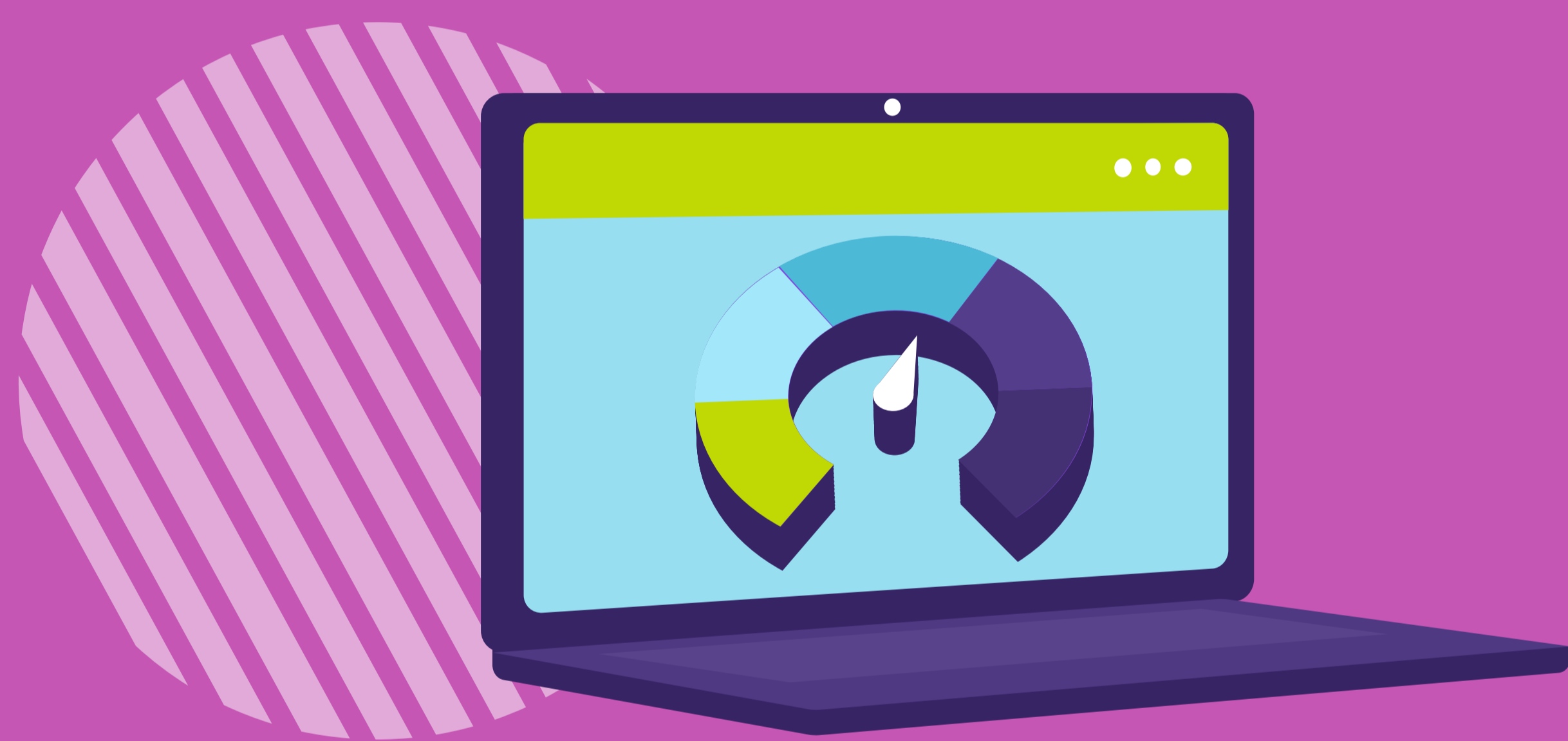
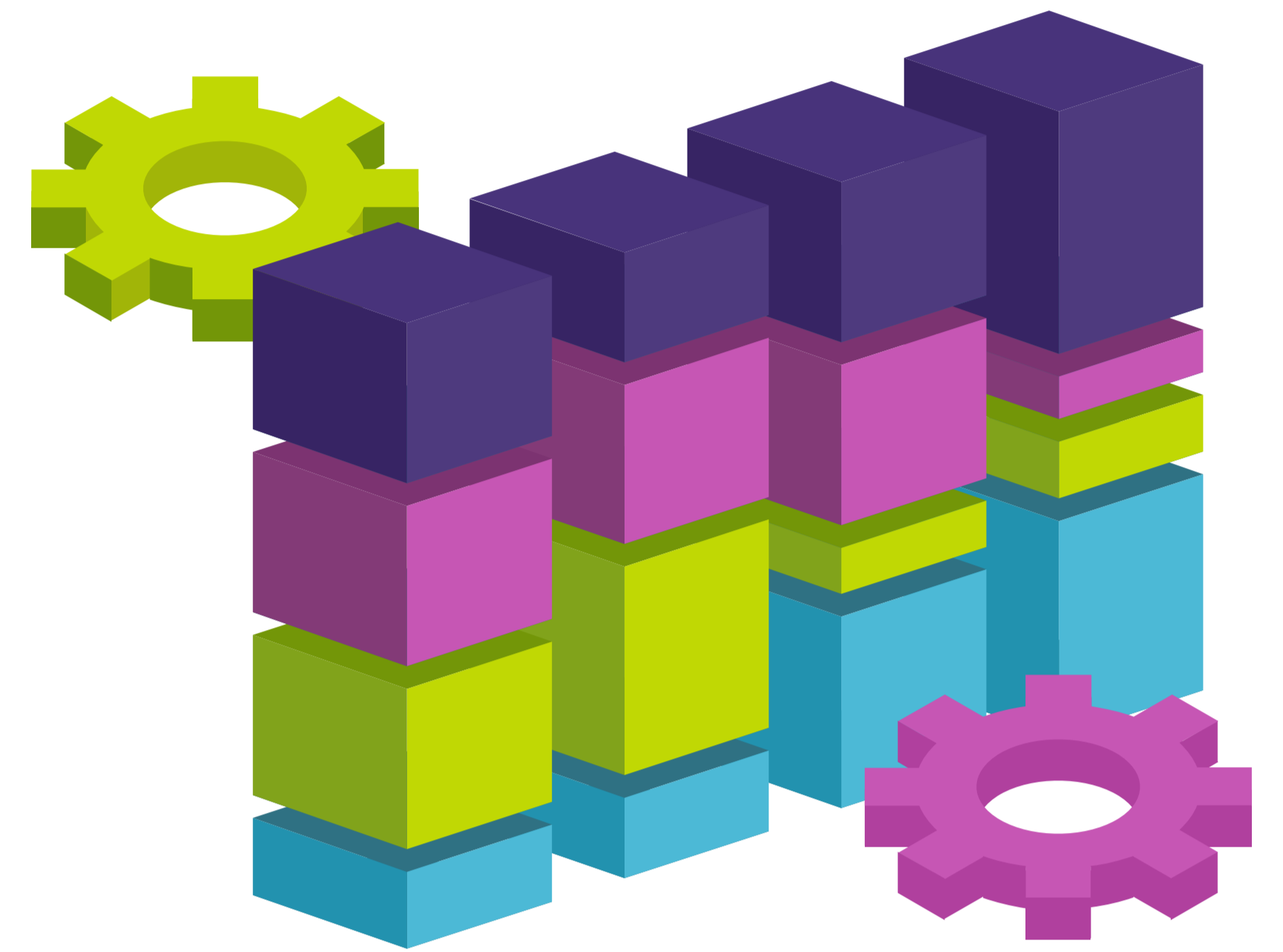
correct and ethical use of its storage

Finally, it is vital to highlight that the **data usage might be limited** as it may be unstructured and incomplete. For example, by having an incomplete history record without the necessary backup of information, sometimes more time is needed to continue collecting data that will allow us to generate definitive behavioural patterns in the future.

Part 4

Behaviour-Based Risk and Fraud Detection Technology vs. Traditional Credit Scoring

Up until a few years back, a credit score was only obtained through traditional credit scoring methods. Traditional credit scores or ratings result from a credit analysis performed by different credit bureaus, indicating whether or not a person or institution is soluble enough to obtain a loan. Previously, these traditional institutions were the only ones that could analyse and score a person's financial history.



With the rise of behaviour-based risk and fraud detection technology, carrying out a much more complete and updated credit analysis on clients and potential clients through behaviour prediction is viable.

With behavioural data, it is possible

to anticipate movements

to obtain more accurate patterns on an applicant's willingness to pay

In this way, banks and financial institutions can reduce the risk of credit default, strengthening algorithms that previously were solely based on traditional data.

Part 4

The conjunction of behavioural data sources and traditional sources has achieved a perfect optimisation of results that traditional data by itself could not have reached.

Among the traditional sources, we find that sources like SEC filings and customer credit scores, even though they add significant value to the market, are unable to provide or anticipate users' future behaviour patterns.

The combination of both types of data allows companies to anticipate user and technology changes.



Consequently, fintechs worldwide are developing behaviour-based risk and fraud detection technology in an effort to capture this market, which is currently underserved but presents a huge opportunity.

These technological innovators are focusing on ways of analysing data beyond the traditional system, and behavioural data is trending as the new solution to the ever-present problem of financial exclusion.



How Behavioural Data Can Open Up Financial Opportunities for Credit Invisibles

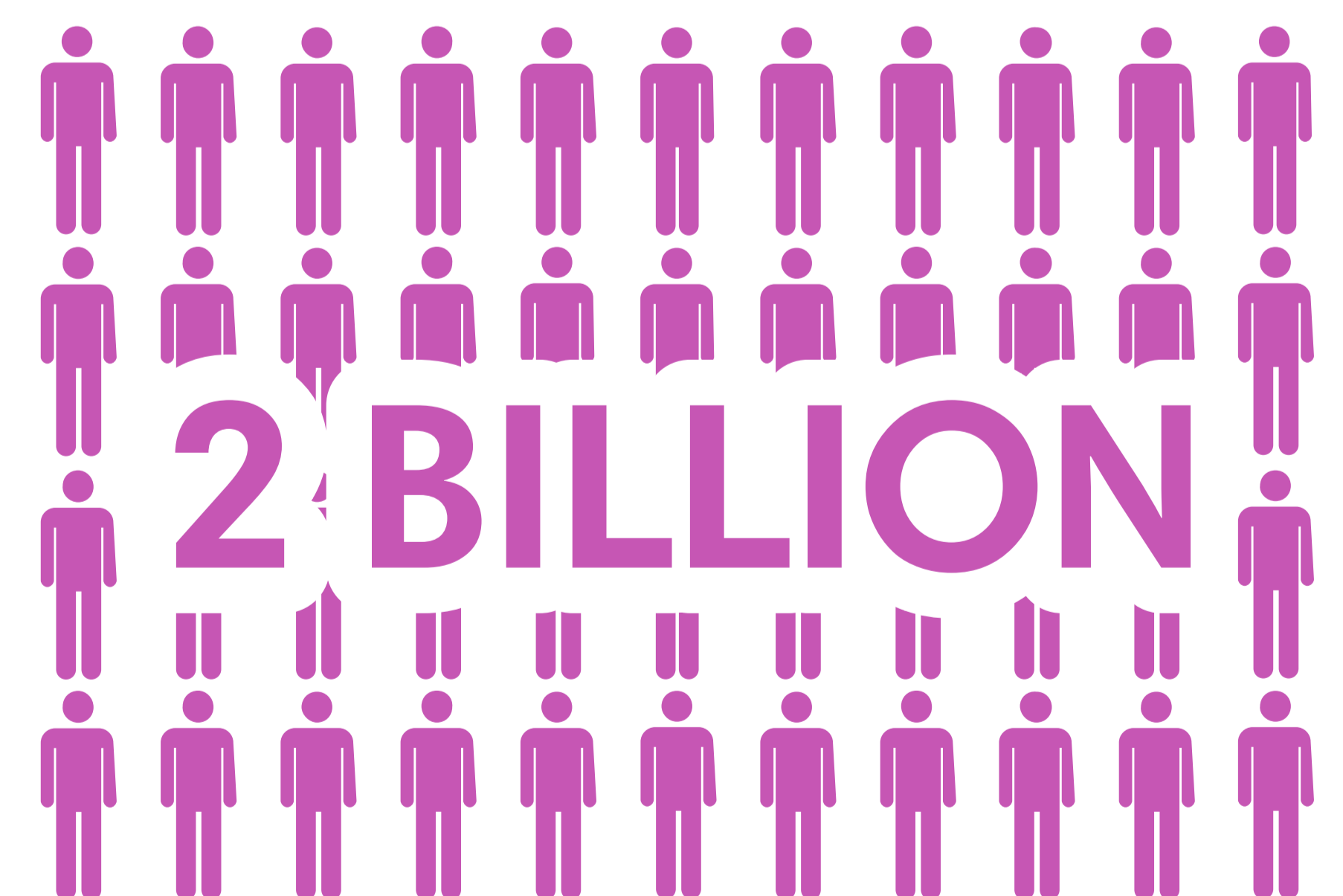
Applying for credit has historically been challenging to achieve. It is even more so for people who have little to no opportunities to build their credit scores.

These people typically consist of young adults who have yet to build their credit history, immigrants who can't transfer their credit report from their previous home country, and people of colour disadvantaged by racial inequality from accessing financial services.

These individuals cannot purchase productive assets such as a car or a house or build wealth with their own resources.

Thus, access to credit plays a vital role in strengthening financial power. However, the downside of the traditional credit scoring system is that it provides little to no opportunities for credit invisibles to prove themselves.

Today, over 2 billion people globally are without formal financial services access because their data is not held on traditional sources. A lack of regular, fixed wages and formal savings adds to financial inconsistency. Existing credit models do not serve the needs of economically active lower-income households and enterprises, which is why many lenders seek an alternative approach.



Part 5

Integrating behavioural data sources in fraud detection, underwriting, and lending processes can significantly help credit invisibles build their credit history and scores.

These sources can include

alternative lending payments

bills for utilities, telecommunications, and rent

demand deposit account information such as recurring payroll deposits and payments, all of which are already part of people's regular financial commitments

With new behaviour-based risk and fraud detection tools, data enrichment systems can complete a person's profile with information from multiple sources in real-time, allowing companies to understand their prospects better and make substantially more informed decisions.

The evolution of new ways of evaluating credit profiles through behavioural data and machine learning mechanisms has generated **a widespread and positive impact on the financial circuit**. Thanks to these new credit review processes, credit approval rates have significantly increased, and thus, a new client portfolio has been created.



Part 6

Using Behavioural Data to Credit Score Millennials

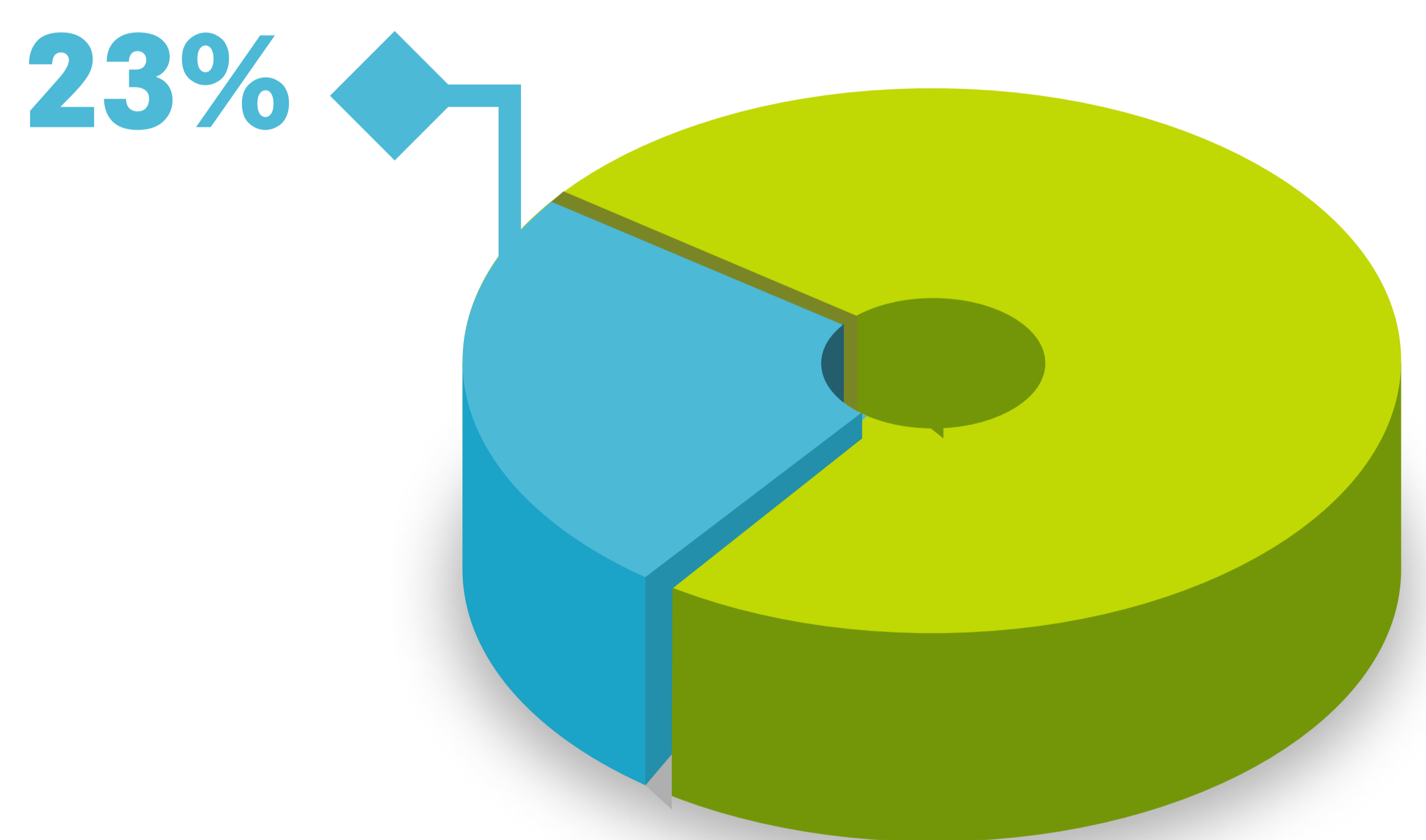
At first glance, the financial profiles of millennials may seem incomplete or complex to banks and financial institutions. Young people in their 20s and 30s are sometimes affected by the lack of credit history and are disabled to meet their goals of buying a home or car, obtaining credit or making an investment. On many occasions, their loan applications are rejected or are imposed with high interest rates that prevent them from obtaining profitable loans.



The lack of traditional credit history does not mean these young people are unreliable or ineligible for credit. On the contrary, many are the ideal clients that financial institutions need.

Millennials are now the largest adult cohort in the world, with 1.8 billion people worldwide, equal to 23% of the global population.

In addition, they live in a world dominated by the internet. Millennials are highly dependent on smartphone usage, spending an average of 3.7 hours daily on their phones. When you factor out average sleeping time, millennials spend nearly a quarter of the day (23.1%) on their phones!*

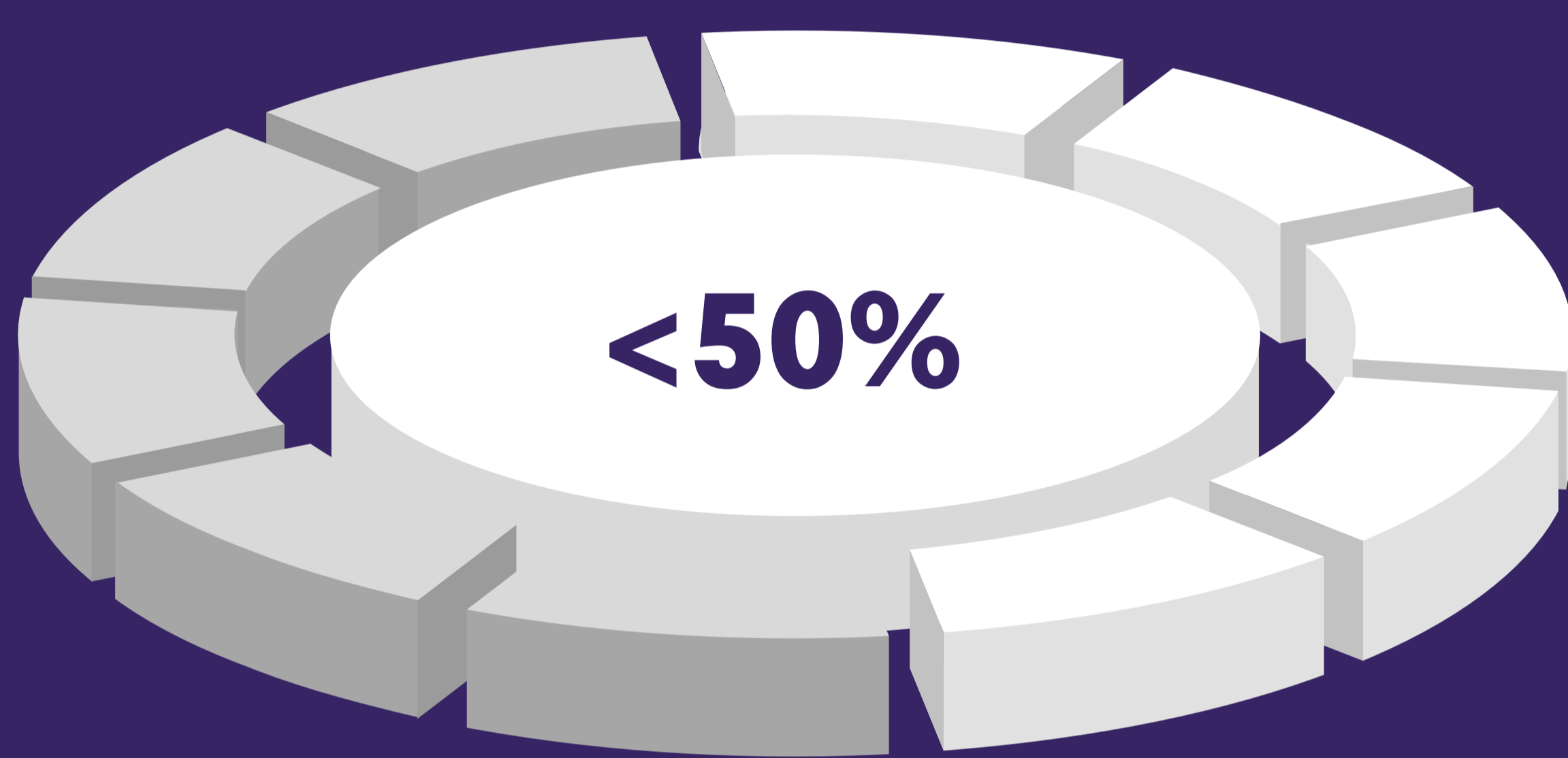


*Source: <https://www.entrepreneur.com/article/360098>

Part 6

With this in mind, it is no surprise that millennials are also largely involved in financial technology or fintech, with e-wallets and other mobile fintech apps helping them complete transactions in their daily lives.

Unlike their parents, their first contact and interaction with banks and money flows is completely digital.



The millennial generation, which will make up nearly half of the working population within the next decade, will continuously increase their purchasing power over time, making them highly influential.

When faced with great demand in the banking market, millennials often opt for fintech startups that meet their credit expectations.

These new companies have a closer relationship with young people, adapting to their needs throughout the entire evaluation process: from their credit assessment to how they communicate.

They also use **behavioural data and score apps to conduct evaluations, making it more likely to grant loans to millennials who do not have a traditional credit history.**

Behaviour-Based Risk and Fraud Detection Technology, an Ally for Many Industries



The utilisation of behavioural data is so broad that it reaches multiple industries such as:

Bank & Consumer Finance

Buy Now Pay Later

Neobanks and Challenger Banks

Digital Lending

Ride-Hailing

Its wide use explains the success of behavioural data in recent years and how new sources of information are redefining the game.

For **Banks and Consumer Finance** companies, behaviour-based risk and fraud detection technology enables customer creditworthiness predictions like never before. By applying scoring algorithms to anonymous metadata, companies can obtain robust personalised models of human behaviour in social, spatial and sequential contexts. This dramatically improves companies' access to new market segments, such as the new-to-credit (NTC), new-to-bank, thin-file, millennials and self-employed.

Digital Lenders also benefit from alternative data. Micro, small and medium-sized digital lenders often have difficulties growing their businesses; all the metrics might be aligned, but access to capital may be lacking, giving larger companies an unfair advantage. Behaviour-based risk and fraud detection technology can help such digital lenders to create more accurate credit ratings and provide more loans to new customers, thus achieving desired growth.

Incorporating behavioural data into financial services helps companies develop accurate credit profiles, make informed decisions, and integrate currently forgotten customers into the financial system.

Part 7

“**Buy Now Pay Later**” (BNPL) has had huge success in recent years as a tactic for acquisition and customer loyalty. Behaviour-based risk and fraud detection technology is essential to segment potential clients that would most likely meet their debts.

The travel industry is one of the many industries that can benefit from this charging system. For example, companies can retain customers who have fulfilled a purchase by offering more payment and credit options.



Behavioural data can also help **Neobanks and Challenger Banks** discover an untapped source of data to de-risk a whole new market, such as those

Unbanked

New-to-credit

Gen-Zs

Gig-Economy workers

Small business owners that, despite their creditworthiness might have failed the traditional credit test

By using behavioural data scores, Neobanks and Challenger Banks can create a path for these individuals to access mainstream financial services.

The use of new credit rating models integrated with artificial intelligence impacts a wide variety of industries by modifying the rules of the game.

Part 8

Credolab: Democratising Modern Risk and Fraud Detection Tools

We believe loans improve lives. We also believe traditional banking processes leave a lot of people out of the process. That's why credolab is changing the way the world looks at credit. Our pioneering technology **improves existing underwriting models and strengthens existing fraud rules** based on people's mobile and web behavioural data— so lenders can make decisions based on the way people live and work in the modern world.



Existing credit models do not serve the needs of economically active lower-income households and small businesses, which is why many lenders are seeking out an alternative approach.

At credolab, we offer a **unique behaviour-based risk and fraud detection technology** designed for these individuals.

In a seamless and privacy-consented way, we help you **collect anonymous metadata - not personal data - while your customers apply for a BNPL product, any cash loan or a credit card.**

The sheer amount of Big Data is precisely why **credolab's statistical models are so impressively predictive and stable.**

Thanks to the **most sophisticated embedded scoring tool available on the market, credolab helps you collect behavioural data from smartphone and web devices.**

Smartphones are in the hands of a large majority of users and leave an enormous digital footprint, with tens of thousands of data points that can be used to predict user behaviour.

Part 8

Credolab's know-how, expertise and experience convert metadata into underwriting insights. Insights can be gained from the most unlikely sources: for example, the number of contacts, how much storage is utilised, and the time of day that phone calls are made – these “features” can be entered into models to determine credit scores.

Without adding any friction to your user journey, we calculate a predictive behavioural risk score that **complements your existing models** (including models that already incorporate credit bureau information) and **improves your ability to approve more customers, more confidently.**



Despite being a promising resource, mobile phone data acquisition draws scepticism from customers regarding security and authenticity.

What differentiates credoSDK from all other solutions is that the data is collected in a completely anonymous way, only after receiving the user's privacy consent, and also processed in the form of metadata, not personal data.

Credolab converts non-personal and consented (all above board, legal and proper) digital footprints into behavioural insights for greater predictivity.

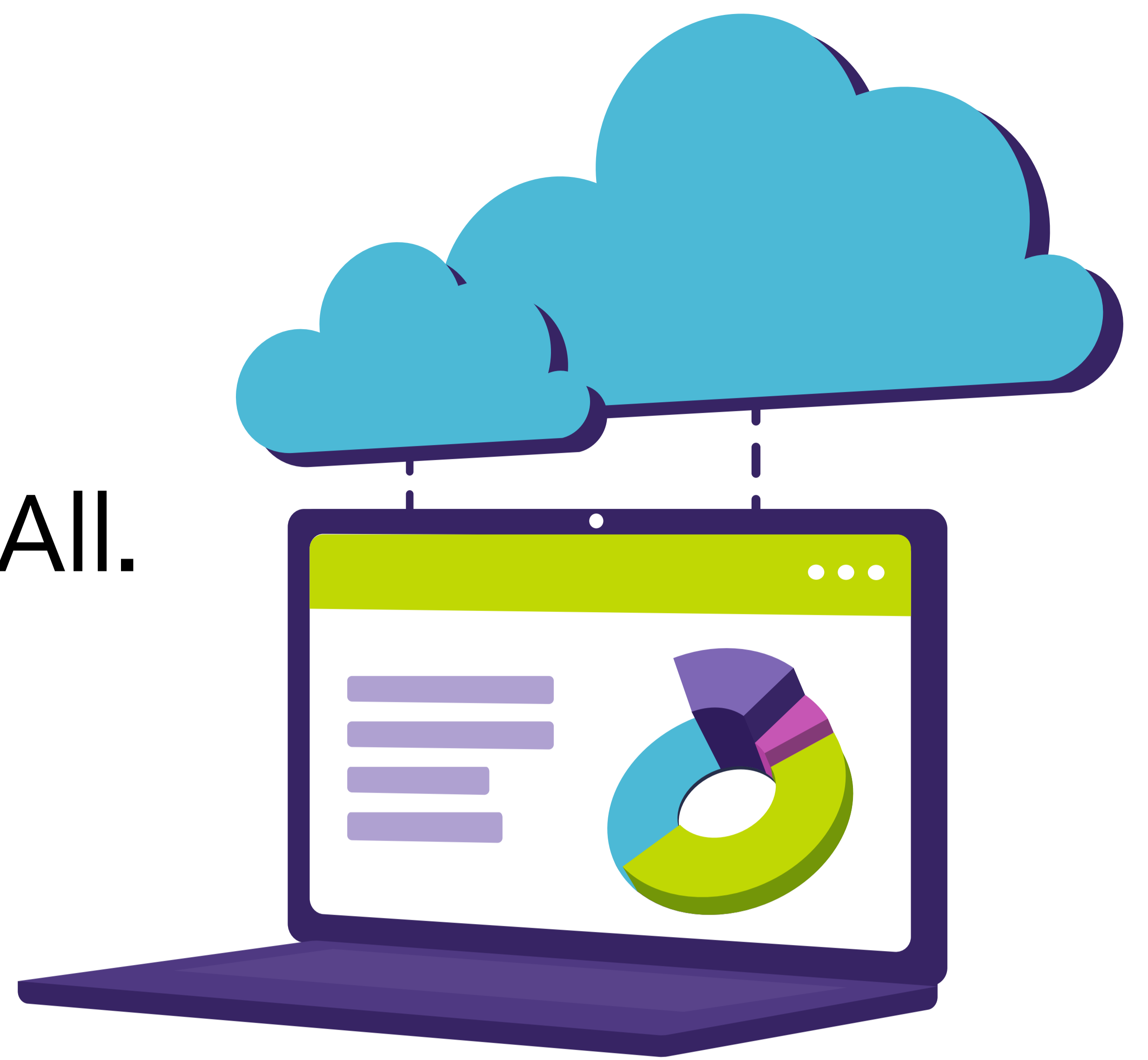
Companies can now **reduce false negatives and false positives** based on evidence; shown in behavioural data from mobile and web use. This previously untapped data means lenders can make decisions based on the way people behave in the modern world – not just how they look on paper.

[Learn more about credoSDK.](#)

About credolab:

Credolab is Committed to Making Credit Available to All.

Credolab is a growing B2B SaaS Fintech that develops bank-grade digital scorecards built on mobile devices and online web behavioural metadata.

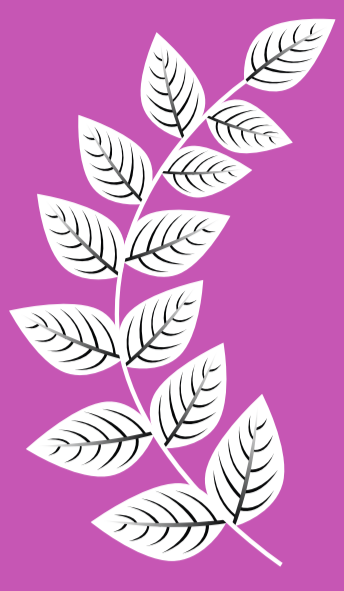


Credolab is the most innovative way to approve more customers more confidently.

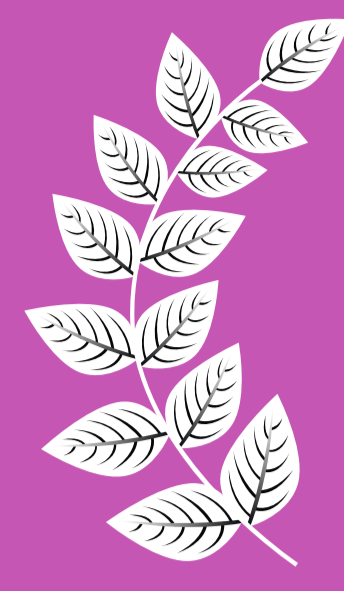
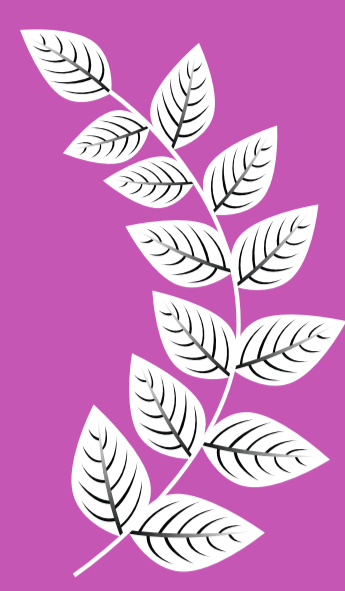
Established in 2016 in Singapore with offices in Kyiv, London, Miami, Jakarta and a distributed team across Sao Paulo, Mexico City, Dubai, Jakarta, Manila, Bangalore, Sydney, and Nairobi, credolab has 120+ clients including well-known fintech companies and unicorns, in over 30+ countries.



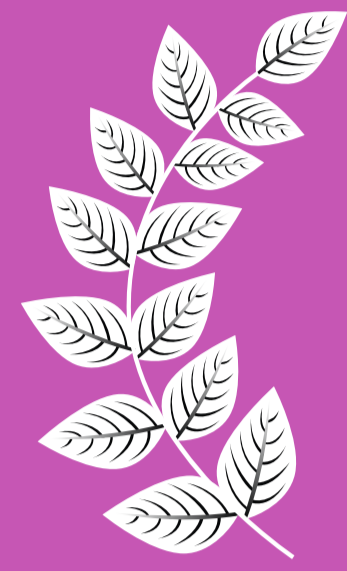
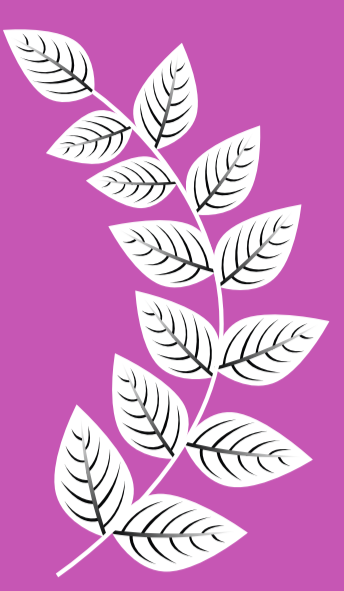
Talk to us today.



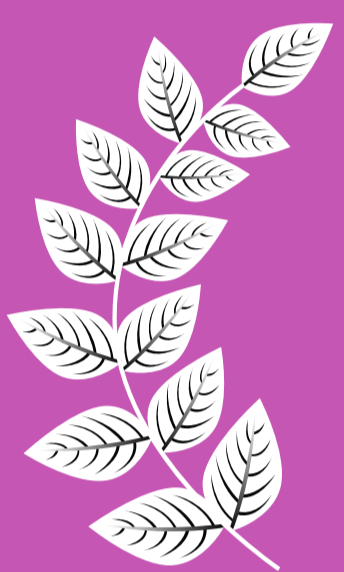
Capgemini Financial Services
Efma Financial
Newtech Watchlist 2021



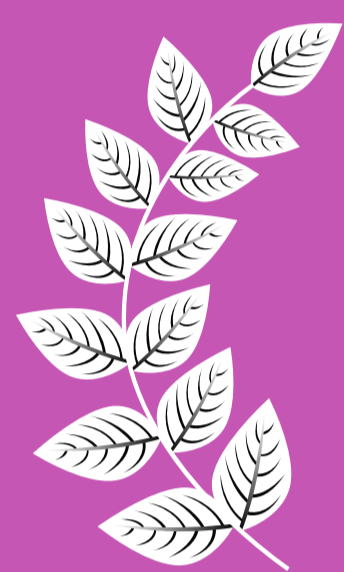
World Economic Forum
100 Technology Pioneers
in the world 2021



Winner of 2021 Financial
Newtech Challenge
“Banking-Scale up” Award



Social Impact Award
SFF Global Fintech
Awards 2021



Singapore’s Top 10
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2021 StartupLanes



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marketing@credolab.com