

Reinventing insurance for the age of IoT

The Internet of Things can deliver the step change in operational efficiency and customer loyalty that the automotive insurance sector needs to remain competitive.

Time for a change

Drivers today feel little loyalty to their insurer. It's easy to see why. Many see their annual premium as a tax on driving, and feel they get little back from their insurers in return.

In fact, most policyholders will have no contact with their insurer until renewal comes around; and any interaction they do have in the interim will be the painful negotiation of a claim.

The traditional ways of doing business may have sufficed in the past, but they won't work in the future. Intense competition and the rise of price-comparison websites have driven premiums down and made it easier for even the most complacent customers to switch.

With revenue depressed, insurers have become dependent on investment income for profitability. Yet a prolonged period of low rates of return are threatening investment yield, too.1

IoT holds the key

Insurers need to drive costs down across their operations, to bolster the bottom line and reduce the dependency on investment income. And they need a way to cement customer loyalty, to reduce price sensitivity and rates of churn and drive revenue up.

The Internet of Things (IoT) is key to making all of this happen. The IoT is already reshaping the rest of the automotive sector, powering today's connected car and tomorrow's autonomous vehicles.

As an insurer, you may have started to use IoT technologies to offer usage-based insurance (UBI) policies to some of your drivers. Although adoption is at an early stage, research shows that customers are receptive.

But UBI is just the start of what IoT can do for you. This report explores five steps that you can take to transform business processes — from customer acquisition and retention to claims — using IoT technology. We'll show you how it can make you more efficient and more responsive to your customers' changing needs in the connected age, helping you transform into a true digital insurer.

For the big picture view of how the automotive sector is being transformed by IoT, see our report "Connected, Automated, Shared".



20%

"rise in the number of customers willing to switch their policy".²

David Rush, Head of Insurance, Deloitte, UK.

50% of drivers would share

of drivers would share thei driving data in return for tailored policies.²



Contents

Step 1: Transforming risk management	,
Step 2: Increasing operational efficiency	(
Step 3: Strengthening customer loyalty and engagement	8
Step 4: Opening new sales channels	10
Step 5: Offering value-added services	12
Succeeding with insurance telematics	14
About Vodafone	1!
References	. 10



Step 1:

Transforming risk management



UBI policies enable insurers to price policies more fairly and encourage better driving behaviour, with reduced fraud levels.

Get the right data to support insurance decisions

UBI is the most familiar use of IoT telematics in automotive insurance. With a UBI policy, the driver has a black box installed in their car (or two-wheeler, company car or fleet vehicle) that provides a stream of data to the insurer. It lets the insurer know when, where and how far the vehicle is driven, and how well the customer is driving, based on how they brake, steer and accelerate. Risk assessment: accurately price premiums to align with actual risk.

The first thing you can do with UBI data is use it to price each customer's policy more accurately, based on a complete picture of risk factors including driving behaviour, plus external data sets such as traffic levels or weather. Consumers will feel their premium is fairer if it's based on impartially measured risk, instead of on blunt demographic factors like age and postcode. This should, if communicated in the right way, improve customer satisfaction.

You will also be able to empower consumers to take control of their risk picture with a greater variety of pricing models and policy types. Consumers could choose to pay per mile or by hour of driving, and choose to reduce their costs by using their vehicles only for limited mileage, on quiet roads or in good weather. In this way, UBI lets you align your revenue against insured risk, even as the policyholder's behaviour changes during the policy term, helping you maintain profitability.

Driving-behaviour assessment: better serve different customer segments

The actual driving behaviour of the policyholder is a major part of UBI. It enables you to collect and analyse customer data to monitor braking, acceleration and deceleration, speed, cornering, and so on.

The first group of customers to take up a UBI policy are those that are a low risk to their insurer. They're the kind of drivers that pride themselves on being safe, and are happy to have the quality of their driving monitored by UBI in return for a lower premium. These customers not only reduce your risk and expenses because they're safer drivers; they're naturally less prone to committing fraud.

Using the driving data insights, you can start to serve other customer segments more profitably and competitively — including those that might have been too risky or costly in the past. For example, many insurers traditionally imposed huge premiums in order to take on the risk posed by new drivers, those with performance vehicles, or those with a history of accidents.

But by offering a premium linked to monitoring driving behaviour, you can encourage drivers to modify their behaviour and comply with policy conditions that reduce risk, and therefore price a more attractive premium.

Industry statistics show there is a 40% drop in crash risk when a new driver has a telematics policy.4 Telematics equipment also helps reduce theft claims and improve recovery, because many UBI devices can also serve as vehicle trackers.

"Insurance fraud is not victimless. It pushes up the cost of insurance for honest consumers. The value of detected fraud is in excess of £1 billion and undetected insurance fraud is estimated to cost the UK economy more than £2 billion a year. Furthermore the normalisation of fraudulent behaviour is socially corrosive and erodes trust." 3

46%

of insurance executives surveyed by Accenture have launched, or are testing, personalised real-time digital/ mobile services to help customers identify, manage and prevent risk.⁵

Black box or smartphone?

Insurers that use the customer's smartphone as the data-gathering device can avoid the need for a black box to be installed. After all, modern smartphones feature GPS, accelerometers and data connections.

Using the customer's device in this way can offer a valuable way to build a relationship. It encourages better driving and can be used as a temporary assessment tool at the start of a policy. For instance, an insurer could require 10 hours of driving monitoring within the first month of a policy to validate that the driver meets the required standards, otherwise the policy is cancelled.

But smartphone-based systems are not a substitute for vehicle-installed telematics systems. Drivers may choose to turn off their phone or leave it at home when they want to head out for a dangerous midnight high-speed blast.

Even when active, the data gathered by the smartphones is less accurate and consistent than that gathered by a dedicated telematics module. And of course, a smartphone is not suitable for applications like stolen vehicle recovery.



Vodafone Automotive offers both smartphone services (Smartphone As A Sensor) as well as hidden black boxes, providing insurance companies the opportunity to choose the most appropriate solution for their customers.

Telematics data processing in action

At Vodafone, we manage driving data from end to end for risk scoring and behaviour analysis. First, the telematics hardware, designed and developed in house, collects and dispatches the data. While in the design phase we use our automotive expertise to filter, normalise and correct the data, ensuring its reliability.

Our hardware devices record GPS data on a per-second basis and accelerometer data at even higher frequency. So the seconds before a crash can be reconstructed in detail.

Collected data is sent to the Digital Ecosystem Platform (DEP), managed by the Vodafone Group's Centre of Competence for Telematics. Here the granular data from the vehicle device is correlated with data from other sources. It is then analysed, and delivered to the service application in the form of risk scores and business insights. We've processed 35 billion kilometres of driving data.

Insurance telematics

Increasing operational efficiency



In the event of an accident, insurance telematics help you take control of the situation and reduce claim costs.

Take control of the situation with instant alerts

A black box installed in the policyholder's vehicle can alert you as soon as an accident happens. Your agents can proactively call the customer on their mobile phone and take control of the situation. They can also call the customer direct if the telematics product installed is a windscreen mounted device.

Once you've got the customer on the phone, you have the opportunity to make a positive impression. Your agents can offer reassurance and strengthen the customer bond by offering guidance and help in a time of distress. This might include arranging replacement car hire and a tow to a local garage for repair, or determining if anyone needs urgent medical assistance.

Gather accurate information about events

The traditional claims process is a painful experience for both policyholder and insurer. It typically takes 15 days for a policy-holder to report a claim (EU average). And when a customer reports a claim, the experience is often poor: they get asked a lot of questions about details of the accident that they don't remember, and the call can end up feeling confrontational and upsetting.

Proactively calling the customer directly after an accident can reduce the cost of claim registration and improve data collection accuracy. Your agents can record immediate statements about the nature of the accident; determine the number plate details of the vehicles involved; and ascertain who was in the vehicle, and what their injuries are.

As some policyholders inflate their claim details in the days following an accident: alleging that additional people were in the car, or that injuries were greater than they are, taking a quick statement also limits these possibilities.

More significantly, telematics data reduces your reliance on driver testimony. Witnesses that have gone through the traumatic event of an accident are often unreliable, while crash reconstruction data is accurate and objective and enriches your view of the incident.

Sensor data will give you a picture of the events before, during and after the crash. How many impacts were there? Was the vehicle braking at the time? How fast was the vehicle going? Knowing the answers to these kinds of questions can help insurers judge liability and decide when to contest a claim, resulting in fairer decisions and potentially reduced payouts.

Vodafone's Secure Operating Centres handle 500 E-button (emergency) calls from drivers every

For personal injury claims like whiplash, the average bodily injury claim settled in Q3 2016 came to £10,674 - a 2.3% increase on the same period in 2015.6

Manage the end-to-end cost of a claims

When your agents are involved right from the time of the accident, you can take control of the many other costs associated with a claim, too. You can instruct your own tow truck and have the damaged vehicle transported to your own contracted garage, where you can control:

- SLAs for turnaround (reducing the number of days for which you have to provide a hire
- Quality of repair (reducing customer disputes)
- Cost of labour (which can save several hundred euros per claim)

In our experience, the overall effect is a saving of 10–16% of total claim cost.

Assess damage through IoT data

In the future, a telematics box in the vehicle might produce other improvements in the claims process. Sensors in the vehicle could report the severity and nature of an accident, providing an immediate way of validating garage repair estimates. If the estimate aligns with the data, a costly, time-consuming visit by a loss adjuster may not be needed.

Data could even be used to indicate which parts might need replacing, or whether the vehicle is an immediate write-off. Your authorised repairer can place an order for the right parts from the best-value supplier before the vehicle even arrives at the repair bay, helping to get it back on the road more guickly.

The most accurate crash detection

Insurance telematics

Vodafone Automotive has been detecting and reconstructing crash events for years. We've evaluated 3.8 million crash events, and currently monitor over 800,000 users. Crashes are accurately detected by the device via a series of predetermined thresholds. The data is sent in near-real time to our digital telematics platform. It's then processed using advanced analysis techniques and algorithms. These were developed in cooperation with a research group of Dipartimento di Elettronica e Informazione del Politecnico di Milano (DEIB). We're also involved in leading international projects that are analysing crashes and trip data.



Insurance telematics

Insurance telematics

Step 3:

Strengthen customer loyalty and engagement



Insurance telematics can help build customer loyalty and retention, establishing a sustainable competitive advantage beyond price alone.

Build interactions to increase loyalty

Insurers need to build stronger relationships with their customers in order to increase loyalty and reduce churn. Such relationships are founded on repeated positive interactions — and telematics provides the opportunity for insurers to initiate those interactions.

For example, telematics data lets you know if a policyholder has scored well on their driving behaviour in a given week or month. You can share this data with the customer to improve transparency and develop a relationship of mutual trust. Using smartphone apps you can notify customers about their risk score, driving stats (including mileage), even how well they're competing against the "average" driver or other named drivers among their friends and family. This is the concept of "gamification": when customers start to see insurance as fun and competitive and a positive contributor to their daily lives.

Pay-As-You-Drive insurance, with a financial incentive and feedback on driving, reduced speeding by young drivers by 14%. It was more effective at reducing speeding on 50, 80 and 100 km/h roads, which are the roads with the highest fatality rates.⁷

For personal injury claims like whiplash, the average bodily injury claim settled in Q3 2016 came to £10,674 – a 2.3% increase on the same period in 2015.6



Using rewards in company fleets

You can use rewards in commercial insurance, too. Instead of rewarding each driver with a low-value offer, you can arrange with the corporate customer to collate and compare driving scores across a corporate sales team or team of lorry or bus drivers. The best driver each month gets a more substantial prize, such as a TV or games console. This turns good driving into a competition, encouraging the whole team to drive more safely and thereby cut the company's overall risk. Both the insurer and the corporate customer benefit from lower risk and lower premium.

From interactions to rewards

You can also take direct action by getting in touch with good drivers and offering a small, unexpected reward — a free coffee voucher or discounted cinema tickets. All the customer needs to do is open up your mobile app to claim the reward.

The cost of offering these rewards is low, and partly funded by the various operational efficiencies that insurance telematics creates across your business. More importantly, these benefits are self-reinforcing: rewards prompt drivers to visit your app and look at their scores more regularly, and it's proven that customers that look at their driving score more regularly are a lower risk therefore cost less to insure. It's a virtuous cycle.

Ad hoc rewards are particularly effective with those drivers that have no connection between their driving behaviour and paying the premium, such as teenagers whose parents foot the bill, or named drivers on a policy. Traditionally these drivers have no clear motivation to reduce risk and bring the cost of the premium down, but by giving them direct rewards, you can incentivise change.

Customers checking their scores more than four times a month have 26% lower frequency of crashes than those that don't, and 30% lower churn.⁸

Use cross-selling to deepen the relationship

Once drivers — personal or corporate — are regularly checking in on their insurance telematics score, you have an opportunity to upsell or cross-sell. This might be offering another insurance product, such as home or health; or perhaps a deal from a relevant partner on new tyres or servicing. As well as add value to the customer, you can take a cut of the revenue on each third-party transaction made through your app.

These kinds of secondary offers can also be used at time of renewal, and can make all the difference in customer retention in a market where drivers switch for just a relatively small saving on their premium.

A stronger proposition

At Vodafone, we work with insurers to provide a joint go-to-market proposition. Put simply, when the customer receives their renewal letter or email, they are offered a renewal premium. While it may not be the lowest price in the market, customers are also offered a discount on Vodafone broadband, free data each month, or a service like Netflix or Spotify free for a year if they take the policy out.

The customer benefits from a great offer, and both Vodafone and the insurer benefit from acquiring or retaining a profitable customer.

All of these touchpoints and offers are based around a new way of thinking about the business of insurance — one in which customer experience matters, where price is not the only determinant of competitiveness, and where an ecosystem of partners from other sectors is key to building a rounded offering.

Step 4: Opening new sales channels



Insurers can leverage non-traditional IoT sales channels to find new customers — but doing so will involve working closely with OEMs and other businesses in the automotive ecosystem.

Create new channels to develop new sources of revenue

The customer journey for motor insurance is well established. Consumers get a number of insurance quotes over the phone or online through a price comparison site, and take out the most competitive policy.

What if there was a way for you to get ahead of the competition and position yourself as the default choice through a new sales channel?

The deployment of factory-fit telematics by automotive manufacturers presents you with the perfect opportunity.

Team up to provide a complete solution

Companies like Vodafone are already working with automotive OEMs to build in telematics features at point of vehicle manufacture.

These devices are often insurance-ready, capturing the right kind of data at the right quality to be used for driving assessment and crash reconstruction. An insurer can form a business relationship with the manufacturer to sell telematics-based policies at the time of the vehicle's purchase. It's beneficial for every party involved:

- The OEM and insurer split the cost of the all-purpose telematics device and connectivity, reducing costs. The insurer doesn't have to arrange for device installation.
- The driver gets a competitive insurance offer that they can arrange at the point of vehicle purchase, and gets to avoid the hassle of an aftermarket telematics device installation.
- The insurer gets prime position in a new sales channel, putting the company ahead of its competitors on the price comparison websites.
- The OEM gets to offer a more complete and convenient proposition inside the dealership.



In Vodafone we work with over

35 vehicle brands today

Find the right business model

There is a certain amount of commercial and process complexity associated with adopting new business and sales models. For example, who is responsible for storing and securing the driver's data? What mechanisms and rights are used for sharing that data between the OEM and insurer? Does any money have to change hands if the driver cancels their policy mid-term?

At Vodafone, we've developed one model that works. Our telematics solution is fully hosted and managed by us, so data from the vehicle is gathered and held on our infrastructure. We deliver data to the OEM's customer smartphone app; we share the driver's risk scoring data with the insurer to get a premium quote and share that with the driver; we then take the payment and share the revenue with the insurer.

In fact, from the insurer's point of view, the functional process is quite similar to dealing with a price-comparison website. From the OEM's point of view, Vodafone is a managed service provider. We've got decades of experience brokering relationships across sectors, particularly when dealing with consumer audiences — remember, we've got more than 470 million customers ourselves.

72%

of insurers are planning to form new distribution partnerships in the near future, or have already done so.⁹



Step 5: Offering valueadded services



Telematics can do more than just improve core insurance services. It can help you evolve to become a digital provider, offering new services across your customers' connected lifestyles.

Diversify into new services

Leveraging an installed telematics service makes it much easier and cheaper for insurers to offer value-added services for the vehicle. These could include emergency alerting for personal safety, breakdown and recovery services, or stolen vehicle tracking. Such services depend on knowing where the vehicle is and its status.

Of course, every service that you upsell is not only additional revenue and data about the consumer, but a great way to demonstrate value between renewals. They give the customer another chance to log in to your portal or app, seeing new offers, content or data.

Data sharing is essential to enable services

Many value-added services — such as breakdown cover — will be handled by a third party; they're simply not core to any insurer's capabilities. As you build up your role in an expanded ecosystem of providers, a certain degree of complexity is unavoidable. You'll need to negotiate the processes involved in sharing data and agreeing commercials between you and the third-party service provider.

For example, a vehicle recovery company will need to know the vehicle's location once a breakdown happens, and in order to offer a competitive, usage-based price for each driver, they may ask for access to details about the policyholder's behaviour throughout the contract term.

Vehicle telematics data can also be used to identify the early signs of mechanical trouble and notify the driver that they need to book in to a garage for preventative maintenance; this can reduce the chance of a breakdown happening, and therefore make telematics-equipped customers a more profitable target audience for breakdown providers. As a result, it could be even more beneficial to form a three-party contract between the breakdown service, you the insurer, and the manufacturer and its dealer network.



In 2016, we recovered almost

1000

stolen vehicles in Italy valued at around €8.8 million. Our quickest recovery took just nine minutes.

40%

of insurers are already partnering with non-insurance companies, or regard this as a high-priority.¹⁰

From insurance telematics to digital insurance

Even the most sophisticated connected vehicle services are only the beginning. You can use the Internet of Things to move beyond the vehicle and start offering digital lifestyle services, particularly if you already insure other categories of risk.

For example, you can extend today's "six wheel" policies into smart transportation policies that cover an individual as they move from car, to motorcycle, to bicycle or even to rental vehicles, car-share schemes, or public transport.

Your home insurance services can be augmented with connected security cameras, door locks and smoke alarms, encouraging the customer to visit your app or portal to check in on their home while they're away on holiday (and note that they may check their driving score while they're there). The cost of in-home connectivity could be split by working in partnership with utilities companies investing in smart metering rollouts.

Location-tracking or health-monitoring wearables can be used to reduce risk and improve pricing accuracy in life, health and travel insurance — and could be promoted in partnership with gyms or corporate employer wellness programmes. Wearables for pets can dramatically reduce the chances of an animal getting lost, stolen or injured, cutting the cost of pet insurance.

The goal, and it's an ambitious one, is to make you as the insurer the single touchpoint for monitoring and managing an individual or family's lifestyle risk, with all data sources feeding in to a single portal. Both the insurer and the insured get a fairer estimate of risk, but more than that the consumer gets the information they need to manage and improve their risk position, which turns the relationship with the insurer into a positive one. The insurer becomes a life companion, not an annual tax.

An integrated ecosystem

The IoT solutions enabled by Vodafone are part of an integrated customer experience that delivers new value added services for the end user customers. Through a unique, flexible and scalable IoT platform, Vodafone deploys solutions for cars, two-wheels, home, fleet health and pets thus creating a connected and integrated insurance ecosystem.



Succeeding with insurance telematics

Usage-based insurance is expected to grow to 142 million subscribers globally by 202311 — and that's just the beginning of what telematics can do for the insurance sector.

Our three recomendations

Insurance telematics can improve risk management, drive cost out of the claims process, enhance customer loyalty through creating opportunities for regular contact, and open up new possibilities for sales channels and revenue-generating services in partnership with businesses from other sectors. The potential is staggering, and due to the cost savings and revenue improvements involved in many of the telematics applications, such projects can be to some extent self-funding.

We've already touched on some of the factors you'll need to succeed with your own telematics initiatives. But based on our experience working with insurers around the world, and with businesses adopting IoT in other areas of automotive, we have three recommendations.

1. Don't try to make one size fit all

The technology powering insurance telematics is the same everywhere: a sensor in the vehicle and a means of communicating over the network. But your implementation must be tailored to the needs of your specific market and its business dynamics. This should affect the data you collect, the way you price your services, how you build your business case, and the partnerships you choose to prioritise.

For example, if you operate in European countries with higher numbers of road traffic deaths like Italy and Poland, 12 you may wish to focus on improving driving behaviour, because that's where you'll see the biggest results. In countries like Germany, however, which has significantly fewer accidents each year, the real value comes from managing the high cost of labour during claim repairs. There you should prioritise accident detection and response to ensure that every damaged vehicle is recovered to a garage you already have a relationship with.

2. Be visionary and pursue new business models

Insurance telematics will only deliver its full potential if you adapt your processes to take advantage of it. For example, you should adapt how you price policies to take advantage of driver data. You'll need to adapt your claims processes — from initial claim registration to damage assessment — to take advantage of crash reconstruction data and automated alerting. But even process change is not enough.

You will likely have to innovate and pursue new business models to capture new sources of revenue: co-marketing third-party services through your apps, agreeing revenue- and cost-sharing agreements with OEMs, and even directly selling non-insurance services to your customer base. If you limit yourself to charging for an annual policy, you'll be missing out on opportunities for customer loyalty, revenue and competitive advantage.

3. Embrace sharing across the ecosystem

No matter how big and well-capitalised you are as an insurer, you are not optimised to deliver the full range of services we've discussed in this document. Success in insurance telematics depends on thinking and acting as part of a bigger ecosystem, and accepting the need to share data, forge alliances and plan for customer journeys that extend beyond the channels and services you control.

For example, you have the potential to form strategic relationships with OEMs to share data, jointly go to market and drive business to each other, to mutual benefit. Such alliances may be new, but they'll be critical to achieving greater ambitions.

Dramatic results from insurance telematics

Insurers that we've worked with see massive benefits from adopting telematics. Comparing telematics policyholders against other customers, they see:



reduction

in fraud

reduction in claim frequency



reduction in customer churn

About Vodafone

Our experience in the wider automotive industry and in Internet of Things technologies gives us a unique perspective on how telematics can transform insurance for the digital age. Here's what sets us apart.

40 years' experience in automotive and beyond

We know the insurance market well, from working with some of the most innovative providers across Europe. But we've also been working in automotive for 40 years, and have over 25 years in developing IoT technologies, giving us a broad and deep perspective on the trends you're facing. Our 900 automotive experts serve not just insurers, but fleet operators, vehicle manufacturers and the aftermarket.

Today you can find Vodafone technology in the vehicles of more than 35 global car, truck and motorcycle manufacturers. We work with every part of the digital insurance ecosystem that you'll be integrating with in the years ahead, and our IoT solutions have already been proven in the sectors that you may extend your services into, including smart home and health monitoring. Of course, we also have relationships with nearly 450 million consumers — relationships that can benefit you.

End-to-end solutions

To create an insurance telematics solution, the black box in the vehicle is just the start. Vodafone Automotive can help you every step of the way, with our unique IoT platform. Our capabilities include hardware design and manufacture, global cellular networks, a powerful software platform, mobile apps for your policyholders, and a complete managed service wrap, led by the highly trained agents in our secure operating centres (SOC) across 44 European countries. We can help you secure and get value from the telematics data you collect.

We actively participate in driving industry discussions that are shaping the future of transportation, and are committed to supporting standards. For example, we taking an active part in standards bodies such as ETSI, the GSMA, and the 3GPP. Our devices exceed the most stringent automotive and insurance standards including those of European bodies like Thatcham (United Kingdom), Kiwa-SCM (Netherlands), Incert (Belgium) and Pimot (Poland).

Global scale

We connect more IoT devices than almost anyone else. Today, more than 50 million IoT devices communicate through us, including more than one million automotive telematics connections. With network operations in 26 countries and partners in 49 more, your customers can connect with us wherever they drive, with a single SIM. And our scale isn't just limited to networks: we currently manufacture over 300,000 telematics devices each year, and our SOC agents handle nearly half a million emergency calls annually, either generated automatically or triggered by the customer.

Find out more

To find out more about insurance telematics and what IoT can do for you, visit vodafone.com/ubi

1

in every 3 UBI activations in the UK is with Vodafone, and across Europe we activate more than 1,000 policies per day.

million connected vehicles on the road today are fitted with our IoT technology.

References

- http://www.insuranceage.co.uk/insuranceage/news/2349111/motor-market-turnsprofit-for-first-time-in-20-years-ey-reports
- http://www.theactuary.com/news/2017/01/ digital-motor-insurance-policies-could-beworth-15bn-by-2020/
- 3. https://www.gov.uk/government/groups/insurance-fraud-taskforce
- https://www.biba.org.uk/latest-news/40increase-in-telematics-motor-policies-in-ayear/
- 5. https://www.accenture.com/us-en/insight-insurance-distribution-survey
- https://www.thesun.co.uk/living/2769144/ car-insurance-soarsto-record-levels-due-totax-hikes-andwhiplash-claims-heres-how-tocut-yourpremiums
- https://www.slideshare.net/ingeniesocial/ ingenie-youngdriverreport2014141201025950 conversiongate01
- 8. https://www.slideshare.net/ingeniesocial/ ingenie-youngdriverreport2014141201025950 conversiongate01
- 9. https://www.accenture.com/us-en/insight-insurance-distribution-survey
- http://news.ihsmarkit.com/press-release/ automotive/usage-based-insurance-expectedgrow-142-million-subscribers-globally-2023-i
- http://news.ihsmarkit.com/press-release/ automotive/usage-based-insurance-expectedgrow-142-million-subscribers-globally-2023-i

vodafone.com/ubi

Vodafone Group 2017. This document is issued by Vodafone in confidence and is not to be reproduced in whole or in part without the prior written permission of Vodafone. Vodafone and the Vodafone logos are trademarks of the Vodafone Group. Other product and company names mentioned herein may be the trademarks of their respective owners. The information contained in this publication is correct at time of going to print. Such information may be subject to change, and services may be modified supplemented or withdrawn by Vodafone without prior notice. All services are subject to terms and conditions, copies of which may be obtained on request.