Spring 2019

"Designthinking"

TECH SPARK

is not just a slogan

THE UX ISSUE

CONTENTS

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[Companies] choosing to invest in [UX and UCD] integration display a significant stock market advantage, outperforming the S&P by an extraordinary 211%.
The Design Management Institute, 2016

Hello and welcome to this special UX edition of Tech Spark. User experience (UX) and "design thinking" have been buzzwords in industry for some years. And it's no secret that, in the financial services sector, we've had to play catch-up.

But the good news is that there has been a giant leap in the quality of user interfaces in our industry in the last three years. **A new generation of consumers have high UX expectations.** User-centred design (UCD) – the strategy for engineering and delivering UX – is placing these users at the fore, and designing around their needs.

As the figures from the Design Management Institute illustrate, there is a robust business case for integrating UCD as a core function of business, as important to the bottom line as sales, marketing or finance.

UCD requires vision and a strong will to change. It is a cultural shift that needs new thinking throughout the organisation. We've designed this issue of Tech Spark to be accessible to anyone interested in UX, whether you want to play catch-up with the industry or want to take UX to the next level.

I hope you enjoy the issue.

Andre Nedelcoux
Head of Digital Consulting
andre.nedelcoux@excelian.com

New idea, old hat.

Words: Andy Hall

Did you know there is a new process for creative problem solving? It's a revolutionary new way of doing things and approaching complex problems.

Universities are running new courses on this practice, businesses are employing 'design gurus' to change the way they do things. Everyone is talking about this new approach. So what exactly is 'design thinking'?

This whole concept is based around involving people in the design process. Involving users in order for things to be usable, having 'empathy', being human-centred, user-centred. Creating a great user or customer experience. Transforming how businesses change the way they do things. Solving complex problems with creative ideas. Using the latest technologies to enable 'transformation'. I could go on …

> **I want to create a passenger experience that feels like floating across the countryside.**
>
> Isambard Kingdom Brunel, Engineer, 1833

THE MAN IN THE HAT

The great British engineer, **Isambard Kingdom Brunel**, designer of suspension bridges, railways and steamships, didn't use the phrases "design thinking" or "user experience" – neither were in use in the 1830s – but both concepts were central to his design genius.

The thing is the 'design thinking' process isn't new. It's a rebadge of 'good design'. It's just that over the years we have lost sight of what 'good design' practice is.

SO WHY DO WE FEEL THAT DESIGN THINKING IS A NEW THING?

From my own experience during design and technology lessons at school we were taught to think about problems in a convergent way. To take the best out of an existing set of choices then take the best out of those choices, converge and execute. We are also programmed to think about things in an analytical way. Take the problem apart and try to solve that one piece of it. This often leads to a very siloed end result.

Design thinking approaches this differently by thinking about problems in a divergent way and to create new choices that haven't existed before. It helps look at problems in an holistic way, creating a 'big picture' and setting a vision. The value of this activity is often relegated or even neglected due to delivery pressures and a common misunderstanding of what design actually is. We don't spend anywhere near enough time thinking in this divergent way, especially in financial services.

Over the last few decades the world has become consumption-driven. This desire for material things has led to design that focuses on aesthetic detail. Design has become a word synonymous with how things look rather than how they feel to use. But things are changing and we are seeing the value of solving problems in a creative way. By using creativity to discover, play, explore and risk-take – where the cost of failure is extremely low and the learning from that failure is very high – leads to better more inventive solutions that are changing the world we live in. These types of creative cultures are what the likes of organisations like Google, Pixar, Airbnb and Netflix, for example, foster.

Importantly though, don't believe all the hype around 'design thinking'. The four-day 'design thinking' bootcamp for £15,000 isn't going to turn your organisation into the next Google. It's not a quick fix. It's not about making everyone designers. Quite simply it's about using a common sense design approach to solving challenging problems. ∎

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Design has become a word synonymous with how things look rather than how they feel to use

For more info and examples of Excelian's design thinking approach for financial services please contact:
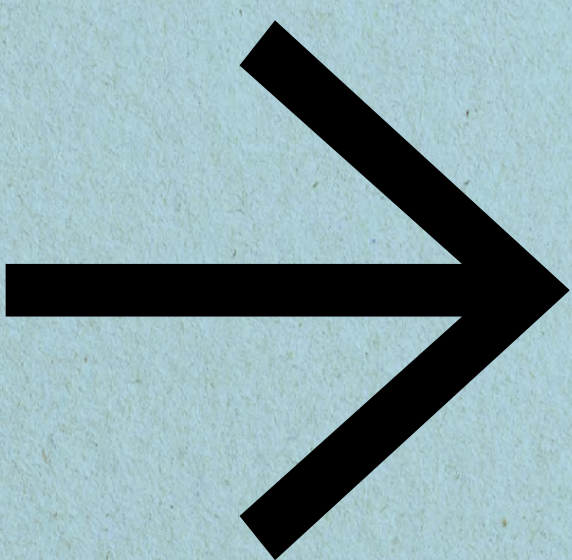andrew.hall@excelian.com

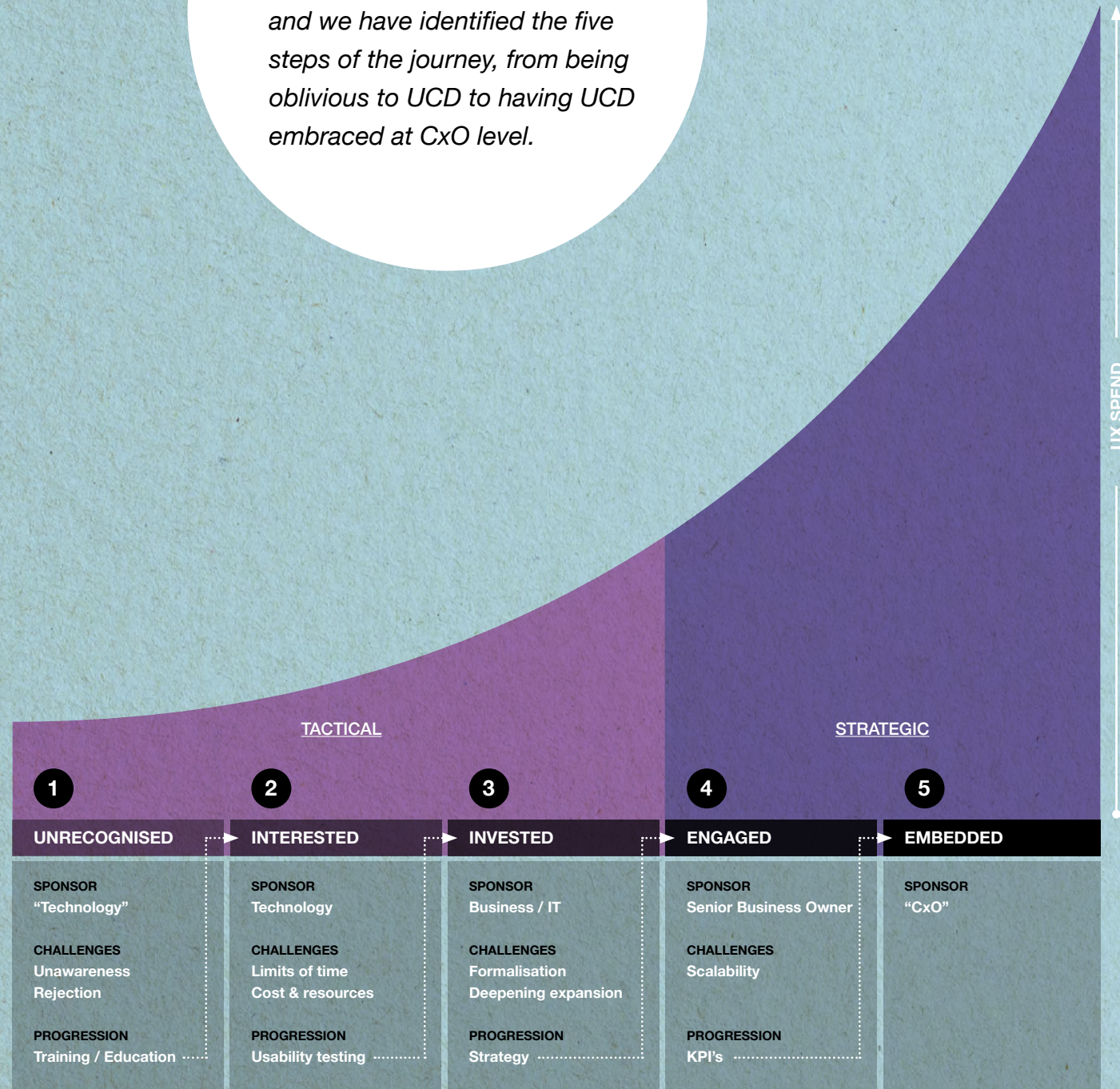# "DesignThinking"

is not just a slogan...

How do you become an organisation driven by UCD (user-centred design)? You need to understand that it is maturity, not novelty, that leads to success. Design thinking isn't a quick fix, it's a cultural change.

Words: Miguel Graca

Understanding your maturity allows you to plan for design thinking. *This process takes time and we have identified the five steps of the journey, from being oblivious to UCD to having UCD embraced at CxO level.*

UX SPEND

TACTICAL

STRATEGIC

1 UNRECOGNISED	**2** INTERESTED	**3** INVESTED	**4** ENGAGED	**5** EMBEDDED
SPONSOR "Technology"	SPONSOR Technology	SPONSOR Business / IT	SPONSOR Senior Business Owner	SPONSOR "CxO"
CHALLENGES Unawareness Rejection	CHALLENGES Limits of time Cost & resources	CHALLENGES Formalisation Deepening expansion	CHALLENGES Scalability	
PROGRESSION Training / Education	PROGRESSION Usability testing	PROGRESSION Strategy	PROGRESSION KPI's	

1 UNRECOGNISED

Organisations at this stage of maturity do not treat UX or design-led activities proactively and often consider design as a necessary hurdle to be jumped as part of the IT process.

There is typically a lack of understanding, ignorance and / or rejection for design at this stage of evolution. There are no dedicated or knowledgeable UX/design resources and, most significantly, there is little desire to change as the organisations can't understand the benefits of design.

2 INTERESTED

This stage is characteristic of a large portion of capital markets clients. They use "design thinking" and "lean design" as marketing terms but have not gone through the organisational turmoil or evolution necessary to actually practice any kind of useful user-centred design.

These organisations tend to design products as if their users think and act just like they do. Users are fictional and often idealised, and they rarely participate in the design process. The common barriers organisations encounter at this level are based primarily on budget, time, and resource constraints.

User testing is a great investment at this stage to overcome any internal resistance, as observing end-users using a product typically overcomes any pre-established prejudice and makes the reality of user-centred design a tangible requirement.

3 INVESTED

Organisations who are in the invested stage often have "somebody" focused on UX / design. There is often a wide range of disparity of approach, understanding and UI output across the organisation as there is no single defined methodology or development approach highlighting when and how UX should be done.

These organisations may have "invested" in external third parties delivering a UCD solution and have typically been involved in the process where they may even have witnessed the benefits of user research and testing but are, however, constrained by either internal politics, IT defining the delivery approach / solution, conflicting agendas of stakeholders (*e.g.* proprietary solution or off-the-shelf package) or even budget constraints to rollout and integrate a more robust and mainstream internal user-centred design approach.

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Organisations or individuals within the "invested stage" who are keen to advance to the "engaged stage", might want to consider a quantitative comparison between a solution which has been rolled out using UCD techniques and one which has not.

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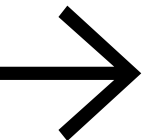
4

ENGAGED

At this stage of maturity, there is typically a user experience function / team consisting of at least a user experience architect, visual designer and either some form of interaction designer or user researcher.

These organisations have an established approach to delivering UI which includes some or all of these functions. But their primary challenge relates to the scalability of the central design function as well as the management, adoption and quality assurance of design across the extended organisation. There is an obvious value to UX services rendered by the central team, however, as this is typically set-up as a cost centre, it is difficult to prove "direct value" in the function and therefore scale the capability internally.

Establishing the right kind of metrics and linking these to the relevant business KPIs will allow these organisations to prove the direct impact the UX design function provides.

5

EMBEDDED

At this stage, the UX / design function is perceived in the same way as marketing, finance and sales.

There is a clear, senior and strategically aligned owner of the function. A defined and integrated revenue and cost structure which accounts for the function as a core capability in delivering a business solution. And, most importantly, a culture, mindset and approach which ensures there is sufficient user input into every product and business insight. Challenges encountered by these unicorns may be due to generational issues and the ignorance of senior executives, including the CEO …

Integration of UX / design isn't easy. It will be an arduous, turbulent and culture-changing process for it to become a mainstream business function. However, the UX / design approach delivers a clear and quantified differentiator to all who deploy it, the ROI of which is already well-documented and proven across many sectors. Great design isn't about being the first past the line. Tesla didn't invent the electric car, Dyson didn't invent the vacuum cleaner and Apple didn't invent the telephone. These companies have got to their dominant positions because of their design maturity: making products that actually work for their users' needs. ∎

> "The UX / design approach delivers a clear and quantified differentiator to all who deploy it, the ROI of which is already well-documented and proven across many sectors.

Want to know more about user-centred design and UX maturity? Please email miguel.graca@excelian.com

The Design Management Institute tracked the performance of companies that followed its UCD criteria, (Design Value Index) against performance of the S&P 500 companies as a whole for ten years from 2005 to 2015.

The Design-focused companies (such as Apple, Coca-Cola, Disney, IBM, Nike, Starbucks, plus others) vastly outperformed the S&P 500 by a remarkable 211%.

211%

DVI

S&P 500

$40K
$35K
$30K
$25K
$20K
$15K
$10K
$5K

06/2005 06/06 06/07 06/08 06/09 06/10 06/11 06/12 06/13 06/14 06/15

The Design Value Index 2005-2015

Why user experience* in finance matters…

How a person perceives, behaves and feels emotionally when interacting with a company, its digital or physical products, or services …

Words: Rob Euman

ABC Bank

Since the financial crash of 2007–08 financial institutions have been trying to regain trust and credibility. Rebuilding these relationship bridges is no easy task and can't be achieved overnight but going forward the financial industry needs to act in a customer's best interest even when it might not be the most profitable option in the short term. Customer empathy has to be the primary pledge rather than profiting off the hoodwinking tactics of the past. Every financial organisation wants to be talked about for the right reasons which is why understanding customers and users of their products and services is so important. There has to be a pledge of putting the customer (the user) first and at the heart of what they do. Only then can these relationship bridges be put in place.

One of the groups that were hit hardest during the crash are Millennials (also known as Generation Y) who now mistrust financial organisations The days of banking with your parents' bank or using their tax advisor are over. Loyalty, in the eyes of Millennials, must be earned. They typically tend to avoid the old school, traditional banks and like to have more hand- on control with a broader spectrum of providers. Their needs are very different to previous generations and rather than look at prestigious, formal organisations they steer towards a more human, open, casual approach.

➔

" 15 steps? I don't have time for this.

" Millennials are on track to be the largest adult segment in the world and have a very different attitude to finance when compared to previous generations.

WHY THE FOCUS ON MILLENNIALS?
Millennials are on track to be the largest adult segment in the world and have a very different attitude to finance when compared to previous generations. Also their exposure to digital is significant, which means they have high expectations regarding digital product and service experiences. This group will be highly influential and will want things differently. They will expect advanced digital experiences in every aspect of their life be it personal or work-related.

Their attitude to brand is different. They aren't uncomfortable with an automotive brand venturing into retail or a sports brand venturing into finance. They are more interested in the experience and quality of services or products and tend to be early adopters of different approaches to market, especially in financial services.

They are happy taking control of their finance with a bigger element of ownership and specifically look for a company's social media maturity and its ethical and social standing. Once a company has a millennial as a customer they are highly loyal. Wealth management is high on the agenda as they typically are almost three times as likely to save more than half of their paychecks each month compared to other groups. Income can often come from different or multiple sources and investing for the future is high on their agenda.
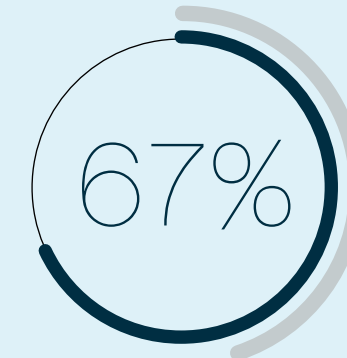
67%
of Millennials are open to products and services from non-financial services brands, compared to **45%** of affluent Generation X-ers.
Forbes

Easy to use, frictionless, intuitive and convenient financial services and products will be in high demand from Millennials wanting to manage wealth.

Any digital experience where they ask themselves these questions will see them running for the door:
● That's not what I expected, what have I done wrong?
● I give up, I can't find what I want!
● 15 steps? I don't have time for this.
● I don't know where to start.

Another key UX factor is that Millennials crave convenience and ease. Finance brands using digital to attract new customers are already speaking the right language. Digital self-service keeps Millennials in control. UX and digital product designers need to keep this at the forefront of their mind because these 'power personae' are critical to the design process.

"Too often UX is seen as an after thought which then often leads to the misunderstanding that UX is a beautification exercise or a UI usability fix, when actually it is the entire design of the product or service experience.

UNDERSTANDING UX AND ITS PRACTICALITIES

The user experience (UX) in financial products and services needs to embrace personal attributes right from the start. Empathy, insight and understanding are critical, as UX starts in the mind not on a screen. Too often user experience is seen as the magic dust you can sprinkle at the end of the process. Brand experiences in banking have shifted, and will continue to do so. The traditional confident corporate blues, the reassuring greens and calming, stable navy blues are being superseded by fintechs using liberal splashes of fluorescent oranges, greens and cyans. The way a finance organisation speaks to you has changed to be more friendly, less serious and more approachable. Typography has shifted from the old school serifs to modern, less formal, sans serifs to bring experiences alive for users.

Financial organisations are moving away from the 'stern, headmaster' persona to a 'trusted friend' and now with open banking are providing a market place full of 'trusted cohorts'.

Too often UX is seen as an after thought which then often leads to the misunderstanding that UX is a beautification exercise or a UI usability fix, when actually it is the entire design of the product or service experience. If a product hasn't gone through some fundamental user involvement this will surface in the long term, leading to more development time, additional expense and in some instances trying to reverse any reputational damage (not an easy exercise once the damage is done).

'User experience' is not magic dust you can just sprinkle at the end of the process …

"

So what are the implications for enterprise UX ?

Millennials now make up the largest generation in the labour market and their employers are not immune to their exacting demands. Organisations need to live and breath internal values that resonate with their employees just as much as their external values do with their customers.

Presenting digital natives with software that takes months to learn just to do their jobs is simply driving them off a cliff edge.

B2B, B2C and B2E have historically tended to have different UX strategies. Today those lines are blurring and the high expectations of consumers are expected in the workplace. After all, why should CEOs, mid-level executives or general employees put up with a worse UX in their work life than they enjoy as consumers?

71%
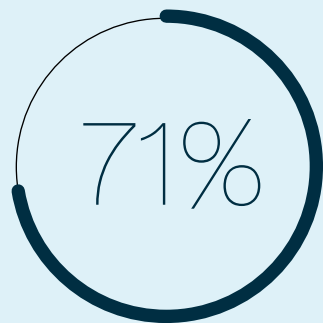
Millennials in enterprise settings who are unhappy with the quality of collaboration tools

Pew Research Centre

Want to know how to shape user experience to stop driving Millennials off a cliff edge? Please email **rob.euman@excelian.com**

KEY TAKEAWAYS

EXPERIENCES HAPPEN EVERY DAY: SOME GOOD, SOME BAD. YOU MAY REMEMBER THEM, YOU MAY FORGET THEM BUT THERE ARE TWO THINGS EVIDENT IN TODAY'S WORLD:

1. PEOPLE ARE EXPECTING A GREAT EXPERIENCE BY DEFAULT.
2. BAD EXPERIENCES GET REMEMBERED AND CAN DAMAGE REPUTATIONS.

Give people a great experience and it makes them positive about their life or makes their job easier, which creates a sense of feeling cared for and considered. They know they have been thought about in a meaningful and valued way. It makes them loyal.

So when creating a new digital product the one of the very first questions shouldn't be 'what technology will we use to deliver the product?' or 'how will we measure KPIs' but 'how do we want the customer / user to feel about us?'. Start with the experience and the other questions will follow.

WHY?
Great experiences = happy and loyal users = self investment, both personally (commitment to company) and financially (product revenue).

Do you *really know* how your users think?

Can you afford to be effectively blindfolded when understanding those who use your product or service? We look at the importance of **user research** to gain insight from the people who really know …

Words: Hiren Patel

Q: How well do you know your users – do you understand what they need, want, like or dislike?

Q: How do you know?

A: Sure.

A: The latest quantitative report shows usage figures, click rates and drop-off rates.

Q: So you have data that tells you the duration of time a user is active on your service / product, if they completed a task or not and what they clicked on … has that data provided insight into what they like about your product / service, or why they even use your product / service?

A: No, but I already know what the next service / product offering is and what my users need.

Q: Do you have insights from users to know the features or services that they may like to have or need?

A: I have the quantitative reports and I am an expert in FS. I have been in this game for a very long time and know what the users need!
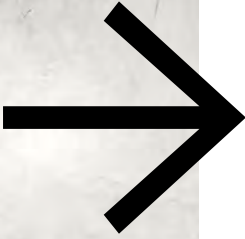
> Too often people bury their heads in the sand, avoiding or ignoring evidence that doesn't fit their preconceptions.

Everywhere in society we find some form of bias. We don't consciously look to apply bias. But we all apply unconscious bias. It isn't driven by malice or intended to cause harm to others, but the consequences can be unexpected. Our daily interactions are surrounded by bias, from news articles on social media that present the authors' guesses as facts, to the fact that men outnumber women in the boardroom.

The same can also be said when decisions are made about what feature to develop or how a workflow / experience should work. If you haven't conducted any user research or engaged with your end-users, you begin to develop and design products and services through your unconscious bias. What you believe to be in the best interests of your users may well be the opposite, leading to limited user adoption, brand damage and costly reworking.

Looking from the outside in, and not engaging with your users, can sometimes blind-side you, causing you to miss the most obvious opportunities or issues that are staring you in the face. Instead, why not actually speak to your end-users, or even put yourself in their shoes? What you may find is that the answers you receive lead you down an alternative path, that brings new ideas, products or services which you may not have conceived otherwise.

You might be thinking to yourself, "OK, so if I speak to my users, understand what they like or dislike, and what they need, how does this help me or my business?" Listening to your users, and understanding their needs, will benefit your business through informed decision-making using facts not assumptions. ■

Investing both financially and strategically in user research up front, before planning what is in your product / services roadmap, will allow you to create longer term benefits, that deliver more value for your money than quick wins that may or may not deliver real business and user value.

Need some help finding that hidden gold dust – the ideas that are actually useful for your audience and for building your product road map? Please email **hiren.patel@excelian.com**

90°

Tales of the un-UX-pected.
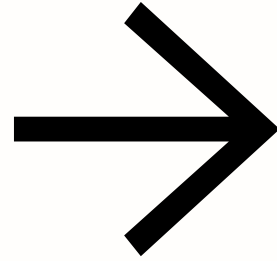
"WE KNOW WHAT IS BEST FOR OUR USERS"

An investment bank had asked for a new trading platform to be designed and delivered. This platform would be developed for desktop computers. Access to the end-users and the trading floor was not possible until a solution was ready for testing.

The design process was led and directed by the product owner who was the designated expert user. By not speaking to actual end-users the solution was being designed through the lens of the product owner and not through any end-user insights. This inevitably led the design direction down a narrow path. Even though the solution that was designed was with the users' best interests at heart, because of the product owner's unconscious bias and assumptions, one glaring user need had been overlooked.

When the day of testing arrived, and the solution was put in front of end-users for the first time, it failed to meet their needs. It didn't fail because of the aesthetics or functionality, because it failed way before aesthetics or functionality could be tested. It failed because of a fundamental assumption about user behaviour.

The new platform solution had been designed to work on desktop monitors in a horizontal orientation, whereas the end-users were actually working with their monitors in a portrait orientation.

Had user research been conducted upfront then their needs and wants would have been identified and accounted for. No prior user research or analysis was conducted, therefore the end result increased costs for reworking the solution and had a negative impact on the brand and creditability of the product team.

If you do not speak to end-users or allow access to them before potentially committing budget for new platforms or platform upgrades, then you are designing and developing through an unconscious bias.

Listen, learn from and work with your users. They know what they need and want better then you do.

90°

A journey to the top

Understanding experiences better, by dissecting our thoughts and feelings, allows us to focus on negative experiences and their key triggers. This can reveal opportunities – to fast track goals, remove blockers and ultimately elevate emotions …

Words: Richard Murray
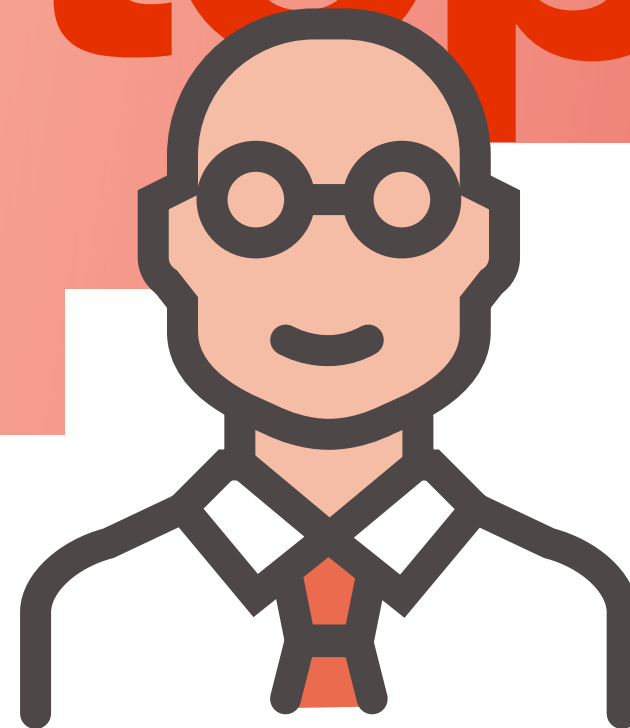
So where do we start? Well we need to work from a scenario with which we are all familiar and cause us frustration – you need to feel the pain to be able to relate. We have all had negative experiences getting to and from our places of work, so this is probably a good example to use. It's important to mention this is about the process rather than the task, so once there is an understanding of the concept you can then take this model and apply it to your professional life – for example, your workflow as a wealth manager, director of finance, senior analyst, CTO *etc*.

Your daily journey to or from the office invariably involves a set of separate milestones that collectively form your overall commuting experience. Hit a blip within one or more of these milestones and it starts to impact on your overall experience. This can start to drag your emotional state into negative territory and then you're on the way to encountering another terrible commute. Three or four bad journeys within a working week could be viewed as a bad week; three bad weeks out of four would be a bad month, and so on.

Realistically most of us cannot avoid our commute but if we can understand where the pain comes from and spot the individual opportunities, perhaps we can switch the twice-daily experience from a collective negative to a collective positive …

→

Emotion is a complex experience of conscious-ness, bodily sensation & behaviour that reflects the personal significance of an event.

Encyclopædia Britannica

As user experience designers we use various techniques to understand goals, behaviours, pain points and triggers. We need to understand the emotions the users are going through at various stages, and discover how we can improve the experience by eliminating the negatives.

In the example to the right we use a customer journey map to break a very simple commute into key individual events, mapped against emotional values – thoughts, feelings and behaviours. This gives us a holistic overview of the overall experience, which clearly highlights the key problem areas for us to discover and develop opportunities.

VERY POSITIVE EXPERIENCE

POSITIVE EXPERIENCE

NEUTRAL EXPERIENCE

NEGATIVE EXPERIENCE

VERY NEGATIVE EXPERIENCE

OPPORTUNITY ZONE

STRESS LEVELS LAYER

OPPORTUNITY 1

OPPORTUNITY 2

OPPORTUNITY 3

DAILY COMMUTE Behavioural events in sequence …	Check weather app on mobile device before leaving the house for the station.	Arrive at station to find heavy overcrowding and multiple train cancellations.	Head to bus stop – check bus timetable app to find when the next bus arrives.	There's a sudden heavy rain shower and no available overhead shelter.	Check bus app again – bus now showing as due in seven minutes …	Bus arrives and there are plenty of seats available
THINKING	App says dry but chilly all day, therefore I'll wear my blazer and a scarf …	I wish there was a reliable alternative that gets me to the office quickly.	App says five minutes until the next bus, its nice to have access to this information.	Hurry up bus, I wish I had brought my umbrella with me!	Is this some kind of wind up?	Thank goodness, I've got a seat / some space, I'll put my music on and zone out.
FEELING	Content and positive. Feeling actually quite pleased with oneself.	Super angry, this is too regular an occurrence. Sudden stress spike.	Mood lifting, stress levels falling.	Annoyed with the weather app for inaccurate information. Stress levels increasing. Wet.	Drenched and pretty fed up. Stress levels continue to rise.	Feeling more positive albeit wet through.
CONSEQUENCE		Alternative route to work required ASAP.		Trust level plummets for the weather app used earlier.	Consecutive negative experiences feel much worse than a single occurrence.	A leap in feel good factor but it doesn't mask the all the negativity experienced.

OPPORTUNITY 1

How can we overcome the negativity, stress and anger we are faced with after yet more cancelled trains and disruption to the service?

There is an opportunity here to get real-time updates for arrival and departure times by downloading an effective train service app. Users could set up a daily notification to inform them of the current service before leaving the house. This way they are able to react and plan an alternative route should the service be problematic, down or running with severe delays.

✓ USER ACTIONS CHANGE 1

OPPORTUNITY 2

If we use a weather app to guide us towards wearing suitable attire for the day then it's imperative this key data is accurate enough to not cause us discomfort – how can we get an accurate prediction of the day ahead?

Users can simply research and acquire a more accurate weather app rather than relying on the default app that comes with their mobile device. Accuracy of forecasts can vary from app to app, so the lesson here is to do your research and find an app that works best for you and your area.

✓ USER ACTIONS CHANGE 2

OPPORTUNITY 3

Again this issue is about receiving accurate data. The bus app was likely to be reporting accurately in terms of bus location, but unable to predict and report pending delays such as heavy traffic, road works or perhaps a spreading out of the service.

This individual situation could be an opportunity for the bus app team to focus on how to improve the experience for their users. The user could again try to find a more accurate app, but interestingly turn over to see what happens if the user makes no change here …

✗ USER MAKES NO CHANGE

Turn over to see how applying these two simple changes affect the overall experience. →

APPLYING THIS PROCESS WITHIN FS

John, a research analyst at a Tier 1 investment bank spends his time trying to identify potential opportunities in the technology sector for his clients. He does this by looking for historic correlations in movements with geo-political, environmental and market events in the hope that these might "explain" future market movements and provide him with reference-able insights he can share with his clients.

A significant part of Johns day is spent looking through news, talking to internal and external market analysts, conducting cyclical analysis and modelling using historic data. The remainder of his time is split between creating research reports and talking to clients either on the phone or via various online communication channels. Johns' most productive time is in the morning once he has had a chance to digest daily news and overnight market sentiment and formulate his thinking. Unfortunately, this can only happen once he arrives at the office as his commute is mostly underground where there is little to no data connection.

There is a plethora of external and internal proprietary systems and applications he uses to access his data and conduct his cyclical analysis with numerous and differing passwords and varied navigation and usability standards. His main analytical application allows him to plot various data series over time although he is often required to write complex algorithms to do this in order to best visualise the resulting timechart in the correct ranges. This has taken him some time to learn and is not intuitive.

John spends his afternoon writing static pdf reports to share with his clients who often request further supporting time based evidence he custom creates for them. He has in excess of 5000 reports in his report repository which he often searches through having to open them one by one to find what he is looking for.

OPPORTUNITIES

Subscription based mobile synchronisation of overnight commentary and news events such that John can access off-line up to date analysis and news during his commute and both bookmark or initiate a cyclical chart build which will be ready for him once he arrives at the office.

A workspace based environment customised by user role where functional "modules" are both recommended and user defined and both single-sign on and data passthrough happens seamlessly such that John is progressively and intelligently pushed relevant and predetermined feeds of aggregated Tech based "news" he can leverage to both support and promote his insights.

A dynamically driven report creation engine and visualisation platform pre-defined by both an organised, searchable and scalable taxonomy as well as preset structure and look and feel relevant to both sector and data types. This would allow John to generate reports dynamically, search for reference-able historic research as well as provide clients with access to dynamic charting capabilities at a click of a button / chart. ∎

FAST FACTS

80%

Organisations that lead in Customer Experience outperformed laggards on the S&P 500 index by nearly 80%.
(Qualtrics)

84%

… of organisations working to improve Customer Experience report an increase in revenue.
(Dimension Data)

$823m

A moderate increase in customer experience generates an average revenue increase of $823 million over three years for a company with $1 billion in annual revenues.
(Temkin Group)

This is the replay of the exact same events in sequence, but now looping in the two simple changes suggested on the previous page
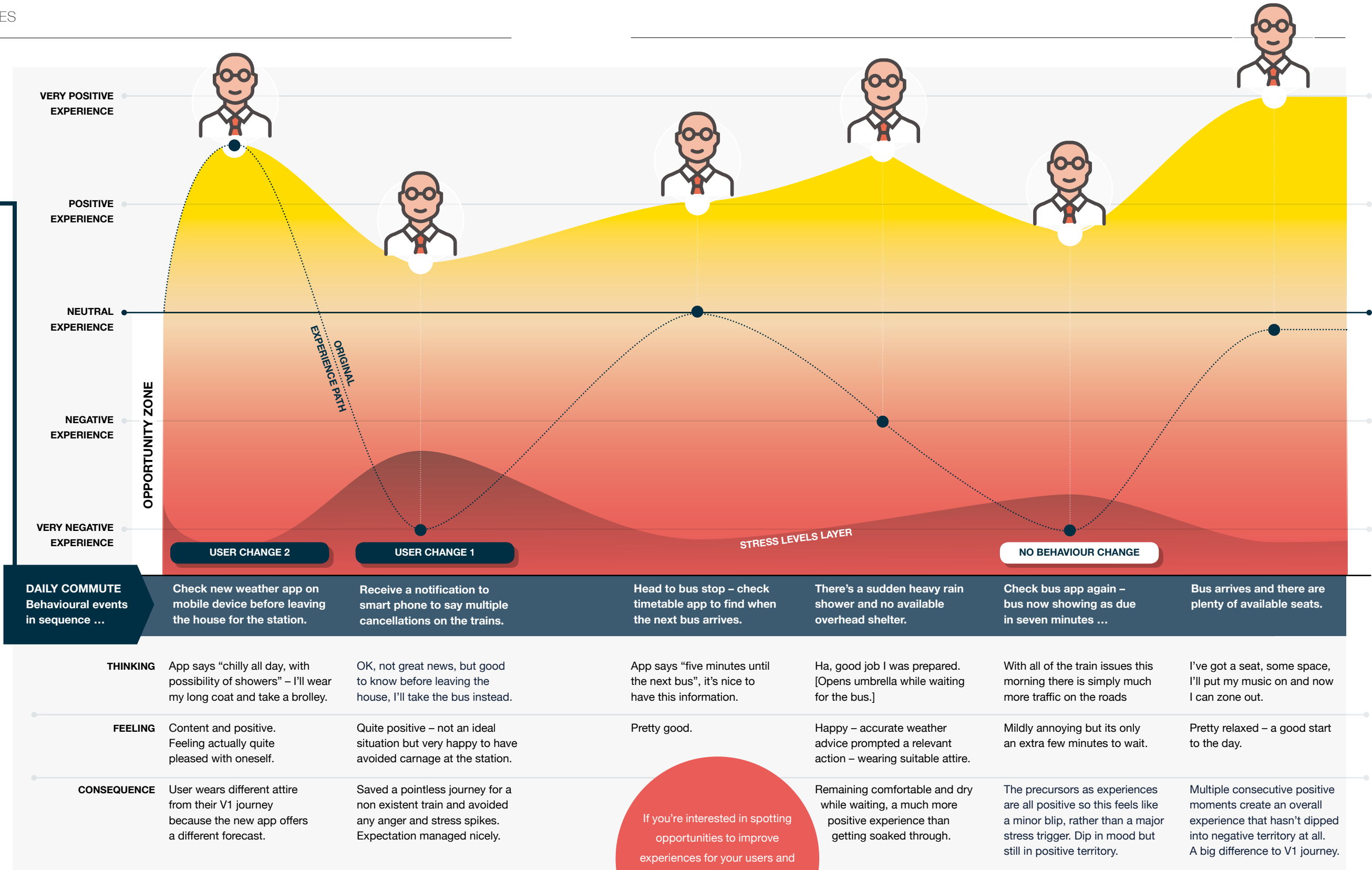
As you can see each individual event has now up-shifted in every instance except the first – where the behaviour has changed, but the positive effects of that change aren't actually felt until the sudden rain shower later on.

The individual experiences are vastly more positive and stress levels very much decreased. Interestingly we didn't change any behaviour for Opportunity 3, and although this presented a slight dip in the overall commute experience it still wasn't enough to drop into negative territory.

Because all the previous events were positive this accumulates goodwill and an uplift in emotions and the actual negative event of the delayed bus doesn't actually pose a large problem. The user is more rational and can find it easier to understand the scenario without it causing too much pain.

Small simple changes can have a big positive impact on experiences, but it's all about finding and focusing on the right areas to make validated adjustments.

Uncover the pain points, stresses and negativities from your users – then you are in a position to make positive changes to delight them. ■

VERY POSITIVE EXPERIENCE

POSITIVE EXPERIENCE

NEUTRAL EXPERIENCE

NEGATIVE EXPERIENCE

VERY NEGATIVE EXPERIENCE

OPPORTUNITY ZONE

ORIGINAL EXPERIENCE PATH

STRESS LEVELS LAYER

USER CHANGE 2

USER CHANGE 1

NO BEHAVIOUR CHANGE

DAILY COMMUTE Behavioural events in sequence …	Check new weather app on mobile device before leaving the house for the station.	Receive a notification to smart phone to say multiple cancellations on the trains.	Head to bus stop – check timetable app to find when the next bus arrives.	There's a sudden heavy rain shower and no available overhead shelter.	Check bus app again – bus now showing as due in seven minutes …	Bus arrives and there are plenty of available seats.
THINKING	App says "chilly all day, with possibility of showers" – I'll wear my long coat and take a brolley.	OK, not great news, but good to know before leaving the house, I'll take the bus instead.	App says "five minutes until the next bus", it's nice to have this information.	Ha, good job I was prepared. [Opens umbrella while waiting for the bus.]	With all of the train issues this morning there is simply much more traffic on the roads	I've got a seat, some space, I'll put my music on and now I can zone out.
FEELING	Content and positive. Feeling actually quite pleased with oneself.	Quite positive – not an ideal situation but very happy to have avoided carnage at the station.	Pretty good.	Happy – accurate weather advice prompted a relevant action – wearing suitable attire.	Mildly annoying but its only an extra few minutes to wait.	Pretty relaxed – a good start to the day.
CONSEQUENCE	User wears different attire from their V1 journey because the new app offers a different forecast.	Saved a pointless journey for a non existent train and avoided any anger and stress spikes. Expectation managed nicely.		Remaining comfortable and dry while waiting, a much more positive experience than getting soaked through.	The precursors as experiences are all positive so this feels like a minor blip, rather than a major stress trigger. Dip in mood but still in positive territory.	Multiple consecutive positive moments create an overall experience that hasn't dipped into negative territory at all. A big difference to V1 journey.

If you're interested in spotting opportunities to improve experiences for your users and or your company, please email richard.murray@excelian.com

Five short, poignant user experience-related statements extracted from author Steve Krug's human-computer interaction and usability Bible …

Don't Make Me Think!

Additional words: Richard Murray

"

What's the most important thing I should do if I want to make sure my app or product is easy to use? The answer is simple … Don't Make Me Think!

Quotation taken from **Don't Make Me Think!** by Steve Krug

Financial products can be very complex indeed. They can support many different workflows for many different users. **It is imperative that the technology created has been suitably considered and crafted, to ensure that each and every user can complete all of their tasks without suffering cognitive overload.**

Like all products, financial services products should be designed to offer the user the fastest, cleanest route to solving the current function. **Well-designed apps take away uncertainty about what will happen when the user clicks a button or a link. Only relevant options, clearly defined, are available to the user – depending on the task at hand.**

"

Most of the time we don't choose the best option — we choose the first reasonable option, a strategy known as *satisficing*. As soon as we find a link that seems like it might lead to what we're looking for, there's a very good chance that we'll click it.

Quotation taken from **Don't Make Me Think!** by Steve Krug

> **"**
> **Once we find something that works** — no matter how badly — we tend not to look for a better way. We'll use a better way if we stumble across one, but we seldom look for one.

Quotation taken from **Don't Make Me Think!** by Steve Krug

Do you really want the people who use your product or digital service to be stumbling through blindly in a highly inefficient manner? **Or would you prefer that the UI is so well thought through and built that using it is an absolute pleasure?**

Do you wish to continue?

Good UX design paired with effective UI design will mean that you breeze through your intended task within your application on auto pilot. If the UX or UI design solution breaks the standard patterns that your brain is used to seeing, it will cause you confusion which subsequently stops you in your tracks.

" **We all parse visual hierarchies every day,** the only time we're even vaguely aware that we're doing it is when we can't do it — when the visual cues (or absence of them) force us to think.

Quotation taken from **Don't Make Me Think!** by Steve Krug

"

If you want a great product, you've got to test. After you've worked on a product for even a few weeks, you can't see it freshly anymore. You know too much. The only way to find out if it really works is to watch other people try to use it.

Quotation taken from **Don't Make Me Think!** by Steve Krug

"Don't Make Me Think by Steve Krug (3rd Edition) is published by New Riders and is available from all good booksellers with an RRP of £33.49"

One difficulty regularly faced in financial services is access to real users. As designers we need to be able to validate and test possible solutions before committing any design to code.
Once developed, it is not only more expensive, it's trickier to change direction if heading on a course that doesn't solve real user needs. If testing with actual users can be facilitated, we are able to prove the product works. And we can iterate from the feedback to make it much more efficient and delightful for the intended audience.

Excelian's user-centred design (UCD) approach enables you to design a digital product based closely on the needs of the user. It provides a view of what needs to be built so the best decisions can be made in order to deliver the right solution.
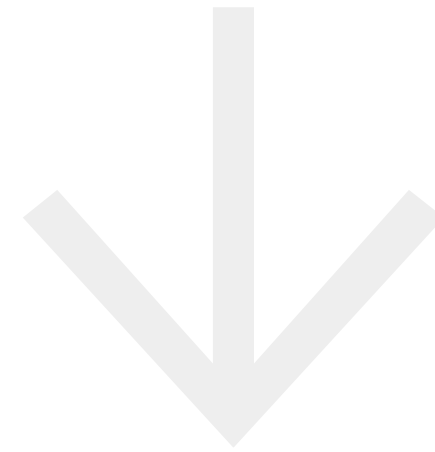
Financial services innovation is a fine balance between the user's needs, the business needs and the technology needs, mapped against desirability, viability and feasibility.

To build out a successful product or service you need to hit the sweet spot bang in the centre of these six dynamics – and the most effective way to make a success of this is to determine your build strategy and adopt a user-centred design approach across all axes.

Words: Andy Hall

OK, it makes sense, but what's my build strategy for User-Centred Design?

1

→ BUY AN OFF-THE-SHELF SOLUTION

Advantages to off-the-shelf software include delivery speed, cost, support and a lot of functionality.

BUT there can be disadvantages, such as too much functionality (90 per cent irrelevant), a steep learning curve or too much of a compromise for users. Adopting software that requires users to workaround natural workflows can be inefficient, unproductive and demotivating. This ultimately has a negative associated cost attached and causes a lot of pain for the business and IT.

90% of an off-the-shelf product's functions may be irrelevant or require a steep learning curve for software users.

2

→ CREATE A FULLY BESPOKE SOLUTION

The obvious big advantages are that the solution can match user needs, be a dream to use, limited licence tie-in or additional costs to vendors and fits your technology infrastructure.

BUT you could be reinventing the wheel, it could cost the equivalent of a small country's GDP and take years to deliver.

" A bespoke solution may cost the equivalent of a small state's GDP.

→

3

→ BUILD A HYBRID SOLUTION

A third possibility is to create a bespoke solution for lets say 70 per cent of your requirements and then use an off-the-shelf solution to meet more generic or simpler requirements.

This is cheaper and faster than a fully bespoke solution and offers functionality much more aligned to your users requirements than an off-the-shelf solution.

Why not get in touch to start a no obligation business strategy solution conversation? Contact:

andrew.hall@excelian.com
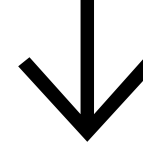
WHY IS USER-CENTRED DESIGN SO IMPORTANT?

UCD leads to fit-for-purpose products and gives you a set of requirements to make better, more informed, decisions on the solution to be delivered – be it off-the-shelf, fully bespoke or a hybrid.

"

Put your users first then drive requirements based on their needs …

WITH CLOSE USER INVOLVEMENT, PRODUCTS ARE MORE LIKELY TO MEET USERS' EXPECTATIONS AND REQUIREMENTS.

User-centred designers craft products for people with specific tasks and workflows in an easy-to-use and intuitive manner that is frequently tested with users, thereby reducing the risk of cognitive overload, human error or fat-finger error.

We follow the Design Council's Double Diamond creative process...

At Excelian we believe that good design comes from following solid design practices. This is why we've adopted the principles of the Design Council's Double Diamond creative process.

Since 1944, the Design Council has championed the case for good design in industry. The Double Diamond creative process comes from observation and analysis of similar approaches used by designers across different disciplines.
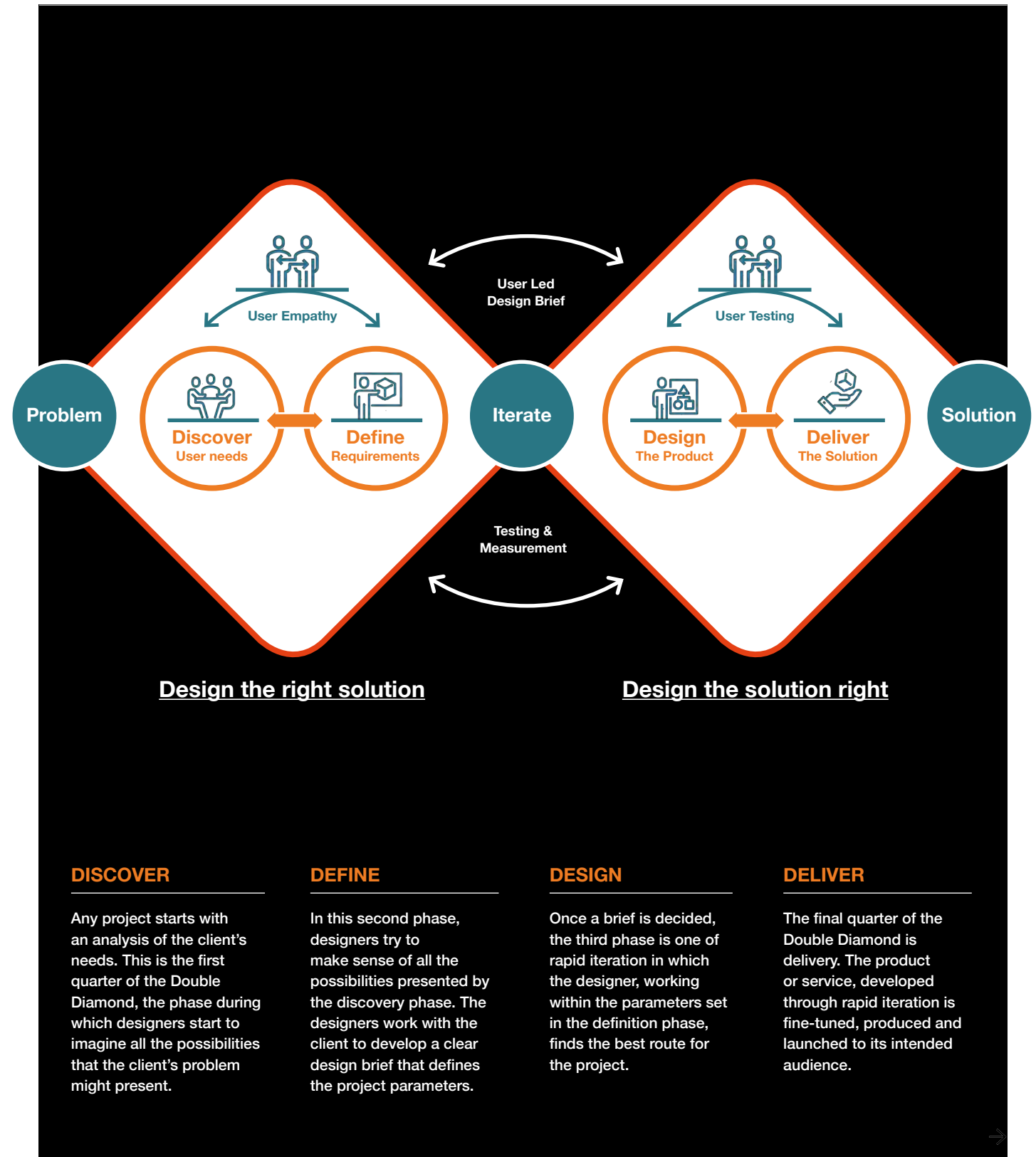
Any design project consists of four phases: discovery, definition, design and delivery. These can be mapped as two diamonds because the four phases aren't just a case of getting from A to D via B and C. All creative processes start with divergent thinking: the list of possible ideas. These are then filtered until a best idea emerges: convergent thinking.

In any successful design project, this creative process happens twice: once in the analysis of the problem and again in the creation of the solution. If you neglect the first diamond, and don't fully understand the problem, you will likely end up developing the wrong solution. The Design Council suggests that the creative process is "iterative", meaning it is a process of repetitive reflection, analysis, design and testing. Really good ideas can only emerge once all the other almost-there and nearly good ideas have been tried and rejected.

To achieve this, the design process needs to be logged. Practical tools such as journey mapping, user diaries and character profiles help steer the project through the four phases.

Really good ideas can only emerge once all the other almost-there and nearly-good ideas have been tried and rejected

Design the right solution

Design the solution right

DISCOVER

Any project starts with an analysis of the client's needs. This is the first quarter of the Double Diamond, the phase during which designers start to imagine all the possibilities that the client's problem might present.

DEFINE

In this second phase, designers try to make sense of all the possibilities presented by the discovery phase. The designers work with the client to develop a clear design brief that defines the project parameters.

DESIGN

Once a brief is decided, the third phase is one of rapid iteration in which the designer, working within the parameters set in the definition phase, finds the best route for the project.

DELIVER

The final quarter of the Double Diamond is delivery. The product or service, developed through rapid iteration is fine-tuned, produced and launched to its intended audience.

UCD in action:

How we designed a digital knowledge sharing environment

for asset managers to collaborate, minimise duplication of effort and share investment intelligence.
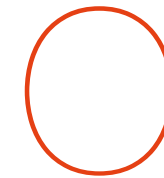
Our client's various investment teams and individuals were researching similar markets and undertaking duplicated activities and there was a significant lack of collaboration and visibility of each other's work and insights.

Duplication of effort was a huge issue, as was the resultant inefficiency from this way of working. Critical insights and intelligence were lost due to the company's disjointed and awkward processes. Company details and information on client accounts were stored in disparate applications, spreadsheets and emails, making it difficult to find a single source of truth.

A typical example of this duplication was when a team in Brazil was undertaking research on the same company as another team in China. Neither team was aware of each other's effort, so the effort was duplicated. To make matters worse, it transpired that another team in Washington had undertaken the same research just six months earlier.

Upon engaging with the client, the business need became clear. A bespoke knowledge platform was needed to collate this intelligence and make it widely available throughout the company. The solution needed to provide the client with an extensive, user-friendly knowledge source that could be easily maintained.

We introduced a user-centred design process to understand the nuances and motivations of how the asset managers worked. This involved face-to-face sessions and shadowing to get a rounded perspective on their workflow and the typical tasks they undertook.
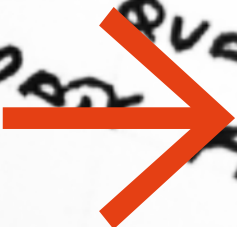
WE BROKE WORKFLOWS DOWN INTO TASKS AND SUB TASKS AND DIVED DEEP TO UNCOVER:

THE TASK TRIGGER:
What prompts an Asset Manager to start their task (including frequency)?

THE DESIRED OUTCOME:
How will an AM know when the task is complete (success)?

KNOWLEDGE:
What will AMs be expected to know to complete the task?

TOOLS:
What software or information do the AMs utilise during the course of the task?

PAINPOINTS:
What are the issues or blockers to completing a task (software, workflow *etc*.)

TOUCHPOINTS:
How, when, why and what?

MODES OF INTERACTION:
Monitor, manage, communicate, research, analyse, execute. How are these fulfilled?

This enabled us to rapidly define, structure and test an experience to enable automatic visibility of similar tasks and workflows using collections of information and was formulated employing techniques used in social network sites. This increased visibility of people and activities across various departments. This also enabled AMs to get away from a siloed, individual outlook on the company and their personal working practices and guide them to a broad, all-encompassing view suitable for successfully collaborating and functioning within the modern investment industry.
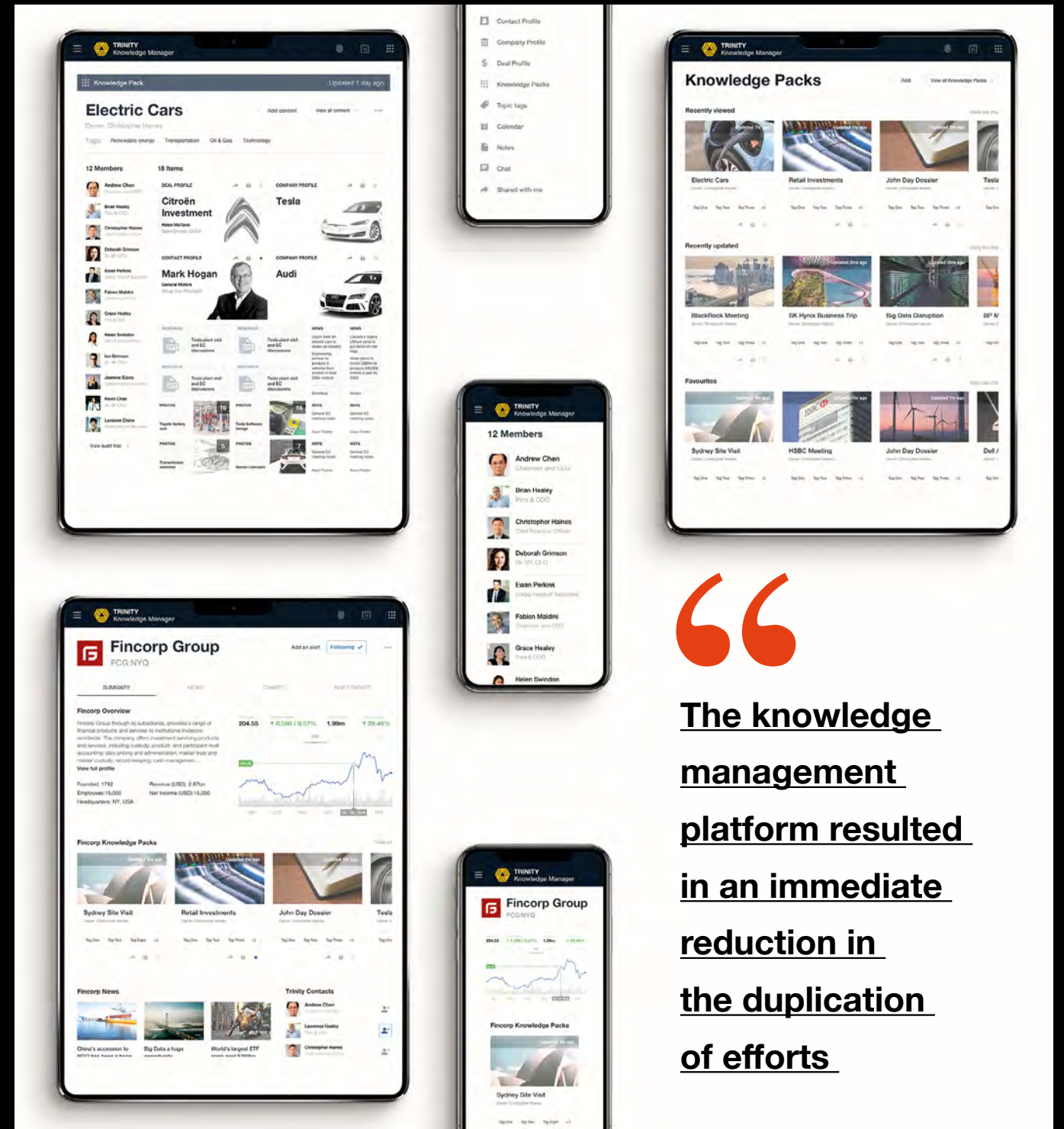
We met 30 investment professionals and 12 stakeholders in order to understand pain-points

The introduction of the knowledge management platform resulted in an immediate reduction in the duplication of efforts the client had previously witnessed. Being able to work on more profitable activities and to better prioritise time were subsequent advantages.

From increasing levels of transparency within the company to boosting staff morale, the entire workstream of the organisation was more efficient as well as simplified. For instance, a research note could be written about cryptocurrency, which could then be edited, viewed and/or shared by certain users in different geographic locations. In addition to decreasing duplication, this change in the way of working for the client fostered an environment of collaboration. ∎

If you would like to talk to us about how we approach user-centred design to solve digital problems in FS, please email
andrew.hall@excelian.com

The knowledge management platform resulted in an immediate reduction in the duplication of efforts

Poor user design in financial services can cost

AWKWARD UI CONTROLS

A simple slip of the finger led a RM to accidentally transfer $6 billion to a single hedge fund customer account.

A CONFUSING SCREEN

A fat-fingered trade by a dealer in the Tokyo Stock Exchange led to the placement of a $622 million order to buy blue chips such as Toyota. The trader had entered both price and volume data in the same column.

NO EXECUTION CONFIRMATION

A trader accidentally placed an order for selling 610,000 shares of J-Com for 1 yen each, while the intent was to sell 1 share for 610,000 yen. The transposition could not be cancelled because of a technical glitch at the stock exchange.

UNCLEAR INPUT INSTRUCTIONS

The FTSE 100 index fell dramatically when an input error on a trade was executed and led to suspension of trading in nine companies. The trader reportedly lost £500,000 on the transaction.

UNINTUITIVE WORKFLOW

An input error led to an £8.1 billion order being nearly placed to buy shares of Autonomy, with the trade value about four times the market capitalisation of the company. Fortunately, the error was caught on time and the trade was cancelled immediately.

These are real word examples which have all happened in Tier I FS organisations.

Object lessons from user experience blunders
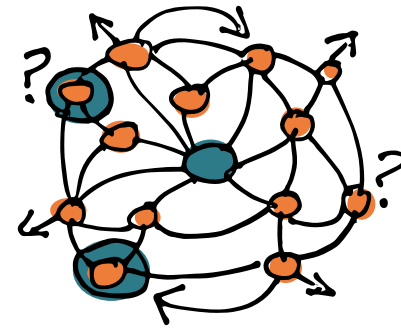
45% OF USERS WILL GIVE UP IF AN APPLICATION IS TOO COMPLEX.

Adaptive Path conducted a study for Bank of America to discover why the bank was falling behind its competition, and discovered that users simply gave up because registering a new account was too complex.

£320M LOST DUE TO POOR APPLICATION EXPERIENCE DESIGN

The Ford Motor Company lost £320m ($400m) after abandoning a new purchasing application, because of poor experience design and excessive support.
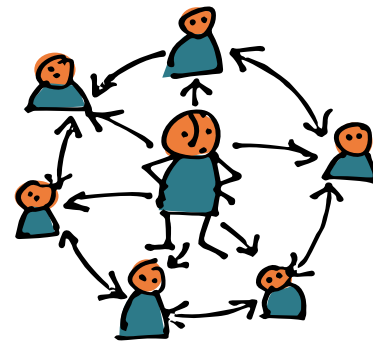
50% OF DEVELOPERS' TIME CAN BE SPENT DOING EXPERIENCE REWORK THAT IS AVOIDABLE

Following UCD best practices helps identify challenges up front so that a solution can be found early.
Dr Susan Weinschenk, Human Factors International
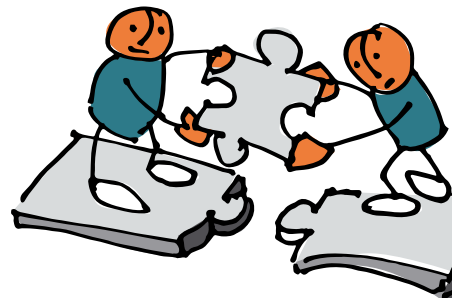
UCD is about building dynamic and delightful solutions around the needs of the users – it is not about solving a business problem with technology then adding a 'nice look and feel' …

If you would like to talk to us about how we approach user-centred design to solve digital problems in FS, please email
andrew.hall@excelian.com

CONTRIBUTORS

Andre Nedelcoux
Head of Digital Consulting

Andre has been working in the financial services industry for 20 years, helping clients make decisions around innovative technologies and new ways of working. He has extensive knowledge of the industry and advises organisations on digital transformation, go to Cloud strategies, modern data architecture but also Digital Experience and the introduction of User Centred Design into the software design process. He is responsible for Excelian's Digital Consulting business globally.

> " **Don't look for innovations: look for innovators!**

Miguel Graca
Head of DPD

Miguel is the Head of Digital Product Design at Excelian. He has significant appreciation and understanding of how the User Centric Design, Data Visualisation and digital innovation processes benefit complex, highly functional User Interfaces and ultimately, create delightful and valuable end-user experiences.

Andy Hall
Creative Director

Andy is Creative Director at Excelian and has 25 years of User Centred Design experience with over 20 years dedicated in digital covering user experience and information design. He helps organisations to use creative techniques to drive design innovation and specialises in complex problem solving for the financial services sector.

Rob Euman
Experience Designer

Rob is a UX Designer with an extensive background in enterprise applications and financial software. He has lead teams across a number of high profile projects in the financial services industry and specialises in data visualisation and scalable design systems that enable efficient and high quality delivery.

Hiren Patel
Experience Designer

Hiren has over 12 years of industry experience working across Finance, Telecommunications, Insurance and Technology. He is an adaptive lead with versatile skills, business knowledge and technical expertise. Hiren focuses on directing the solution design to deliver engaging experiences, which meet business objectives without compromising the experience.

Richard Murray
Experience Designer

Award winning designer with over 18 years experience in various professional creative environments straddling consumer and FS clients. A strong visually lead problem solving creative with an eye for attractive aesthetics, while employing keen attention to detail. Richard designed and art directed this UX issue of Tech Spark.

Lisa Bhudia
Designer

Lisa a graphic designer working across both print and digital. With over 5 year's experience she has worked both in-house and client facing projects. She began her career within publishing then moving on towards working within the Fin-tech industry. Previous projects include working with a variety of tier one and tier two banks.

"You can use an <u>eraser</u> on the drafting table or a <u>sledgehammer</u> on the construction site.

Frank Lloyd Wright, Architect