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Changing Risks, Expecting the Unexpected

17th Global Conference of Actuaries & 2015 AGFA

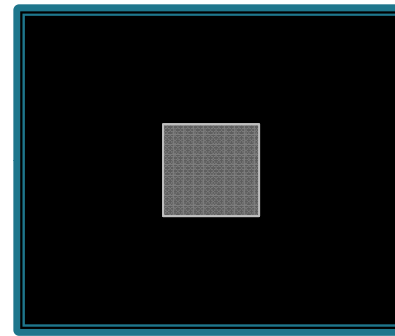
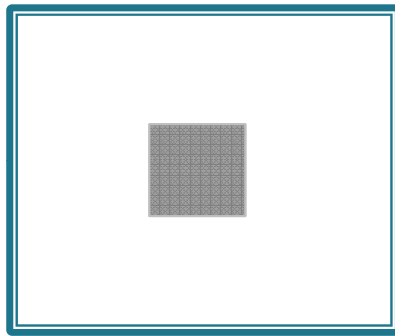
2nd & 3rd February, 2015 Mumbai - India

Behavioral Economics is real and applied to other disciplines with proven results

Our discussion today:

1. What is Behavioural Economics (BE) ?
2. The insurance perspective
3. BE explained through "MINDSPACE "
4. Evidence: BE applied
5. BE applied to insurance:
 - Low insurance penetration
 - Reducing non-disclosure rates
 - Product design innovations

Contexts/circumstances and other cues influence the decision making processes

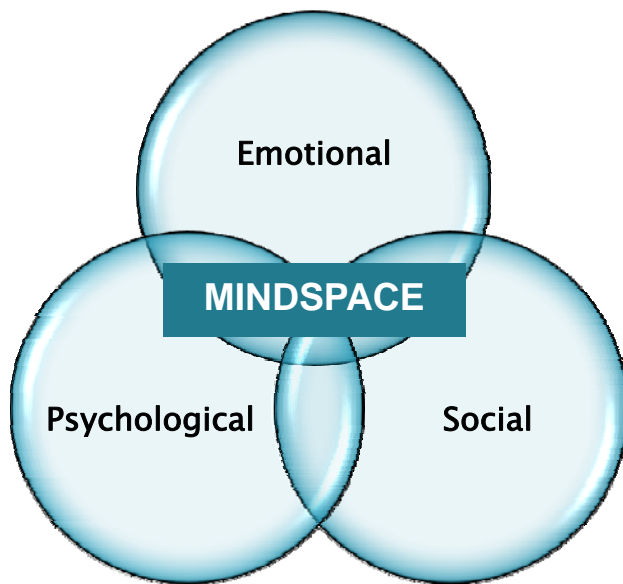


Applying Behavioral Economics to Health Insurance shapes the way we do the business

Behavioural Economics

applied to insurance

has real life applications



Risk aversion

Insurance

Health
insurance

Reduce non
disclosures

Understand low
penetration

Increase sales and
SI levels

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Quantum of gaining (or losing) at varied probabilities has strikingly different human behaviours (decisions)

	Gains	Losses
High Probability (Certainty Effect)	<ul style="list-style-type: none"> 95% chance to Win Fear Disappointment Risk Averse A	<ul style="list-style-type: none"> 95% chance to Lose Avoid Losses Risk Seeking B
Low Probability (Possibility Effect)	<ul style="list-style-type: none"> 5% chance to Win Hope of Large gain Risk Seeking C	<ul style="list-style-type: none"> 5% chance to Lose Fear of Large Loss Risk Averse D



Avoiding loss is more motivating than pursuing equivalent gains



Human behavior is risk seeking for losses and risk averse for gains

Quantum of gaining (or losing) at varied probabilities has strikingly different human behaviours (decisions)

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High Probability (Certainty Effect)	<div>A</div> <ul style="list-style-type: none">▪ 95% chance to Win▪ Fear Disappointment▪ Risk Averse	<div>B</div> <ul style="list-style-type: none">▪ 95% chance to Lose▪ Avoid Losses▪ Risk Seeking
Low Probability (Possibility Effect)	<div>C</div> <ul style="list-style-type: none">▪ 5% chance to Win▪ Hope of Large gain▪ Risk Seeking	<div>D</div> <ul style="list-style-type: none">▪ 5% chance to Lose▪ Fear of Large Loss▪ Risk Averse

Insurance

▶ Avoiding loss is more motivating than pursuing equivalent gains

▶ Human behavior is risk seeking for losses and risk averse for gains

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MINDSPACE explained:

9 robust influences on human behaviour and change

Messenger

We are heavily influenced by who communicates information to us

Incentives

We often respond to incentives using mental shortcuts

Norms

We tend to do what those around us are already doing

Defaults

We go with the flow of pre-set options

Salience

We respond to things that are novel and that we can understand

Priming

Our behaviour is often influenced by subconscious cues

Affect

Emotional associations can powerfully shape the way we behave

Commitment

We seek to be consistent with our public promises, and reciprocate acts

Ego

We act in ways that make us feel better about ourselves

Source: *Influencing Behaviour Through Public Policy*; Paul Dolan, Michael Hallsworth, David Halpern, Dominic King, Ivo Vlaev

MINDSPACE EXPLAINED

M **MESSENGER**
We are heavily influenced by who communicates information to us
The weight we give to information depends greatly on the instinctive reactions we have to the source of that information

I **INCENTIVES**
We often respond to incentives using mental shortcuts
Incentives are used as a mechanism to motivate behaviour change but we often respond to them in strange, but predictable ways

N **NORMS**
We tend to do what those around us are already doing
We behave in ways that are influenced by the explicit or implicit behavioural expectations, or rules, of the society or groups we belong to

D **DEFAULTS**
We 'go with the flow' of pre-set options
Many decisions we take have a default option, whether we recognise it or not. It is seen that we have an in-built bias to accept the default, even if it has significant consequences

SALIENCE

We respond to things that are novel and that we can understand
We subconsciously filter out much of the information we receive. As a consequence our behaviour is greatly influenced by what our attention is drawn to

PRIMING

Our behaviour is often influenced by sub-conscious cues
We act in ways that can be altered if we are exposed to certain cues beforehand - such as sights, words or sensations

AFFECT

Emotional associations can powerfully shape the way we behave
We are strongly influenced by our feelings and emotions. Emotional responses can be rapid, so that we experience a behavioural reaction before we know what we are reacting to

COMMITMENT

We seek to be consistent with our public promises, and reciprocate acts
We tend to procrastinate and delay taking decisions that are in our best interests. Commitment devices are widely used to counter our will-power weaknesses

EGO

We act in ways that make us feel better about ourselves
We tend to behave in ways that support the impression of a positive and consistent self-image.

S
P
A
C
E

WHAT IS MINDSPACE?

Influencing behaviour is central to public policymaking. Major advances in understanding what determines our behaviour means that we now have a new set of potentially powerful tools to use in challenging areas such as crime, obesity and recycling activities.

MINDSPACE outlines nine robust influences on human behaviour and change. These principles are underpinned by considerable research from the fields of social psychology and behavioural economics. They are therefore presented as the most robust effects that policy-makers should understand and, if appropriate, use.

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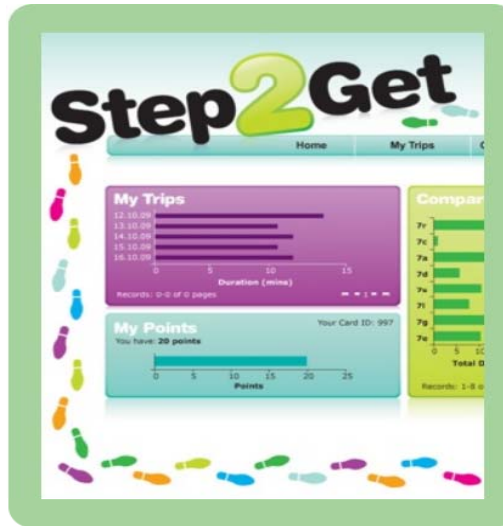
Behavioral Economics is real and has proven to improve the behaviors towards better decisions



- Salience
- Social norm
- Affect
- Incentives



60%



- Priming
- Salience
- Social norm
- Incentives



18%



- Reciprocation
- Commitment
- Social norm
- Incentives



400

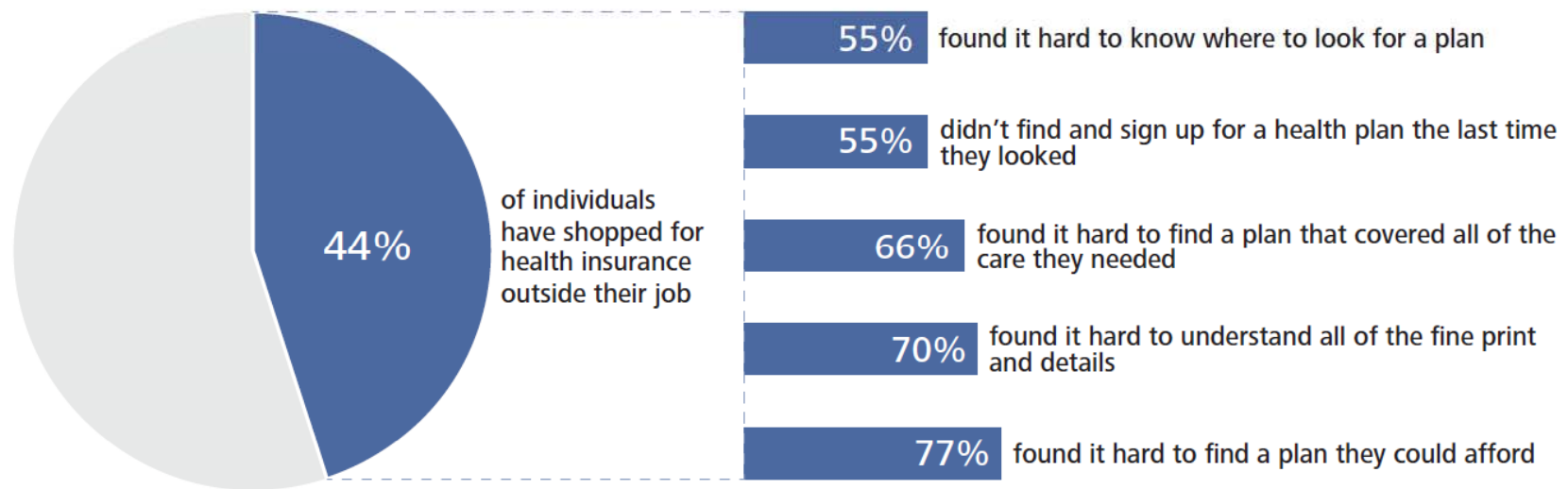
(Source: Cabinet Office Behavioural Insights Team, 2013)

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Health insurance is almost a necessity in developed markets yet a challenging one to buy



Lower awareness in India poses a much bigger challenge. BE offers the insights and tools to address this problem with better understanding

(Source: Lake Research Partners and Inform America, *Informing Enroll America's Campaign: Findings from a national study*, January 2013, p. 9, <https://s3.amazonaws.com/assets.enrollamerica.org/wpcontent/uploads/2013/11/InformingEnrollAmericaCampaign.pdf>. N = 1,814 adults ages 18 to 64 at or below 400 percent of the federal poverty level.)

Costs are increasing and Lifestyles are stressful demanding more Health Insurance than ever

Business Standard

Wednesday, January 21, 2015 | 09:10 AM IST

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70 per cent Indians have no health insurance: study

Press Trust of India | New Delhi January 20, 2015 Last Updated at 16:20 IST

Quick Links

Understanding the main reasons for low penetrations holds the key for better sales strategy

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BE explains why it is difficult to sell insurance

Framework	FMCG	Health Insurance
Good Type	<ul style="list-style-type: none"> • Tangible good • Physical product 	<ul style="list-style-type: none"> • Intangible good (promise) • Selling Concept (Risk Aversion)
Psychological Desire	<ul style="list-style-type: none"> • Necessity for survival • Convenience • Luxury 	<ul style="list-style-type: none"> • Attention Constraint • Calculation Constraint • Myopia
Strategy to Follow	<ul style="list-style-type: none"> • Best value for money • Brand consciousness • Accessibility 	<ul style="list-style-type: none"> • Left for chance (Do nothing) • Family support • Get Insured
Choices We Make	<ul style="list-style-type: none"> • First timers – Reviews • Based on features • Inertia And Stickiness 	<ul style="list-style-type: none"> • Highly technical • Complex terms and conditions • Not sure of benefits
Experience to Follow	<ul style="list-style-type: none"> • Like it – Buy it again • Else – Look for an alternative product 	<ul style="list-style-type: none"> • No Claims made (is it required ?) • Claim rejection – feel cheated • Claim paid – Insurance value seen

(Source: Cabinet Office Behavioural Insights Team, 2013)

Application 1: Poverty Segment

Poverty headcount ratio at national poverty lines (% of population)

21.9%

2012

29.8%

2010

37.2%

2005

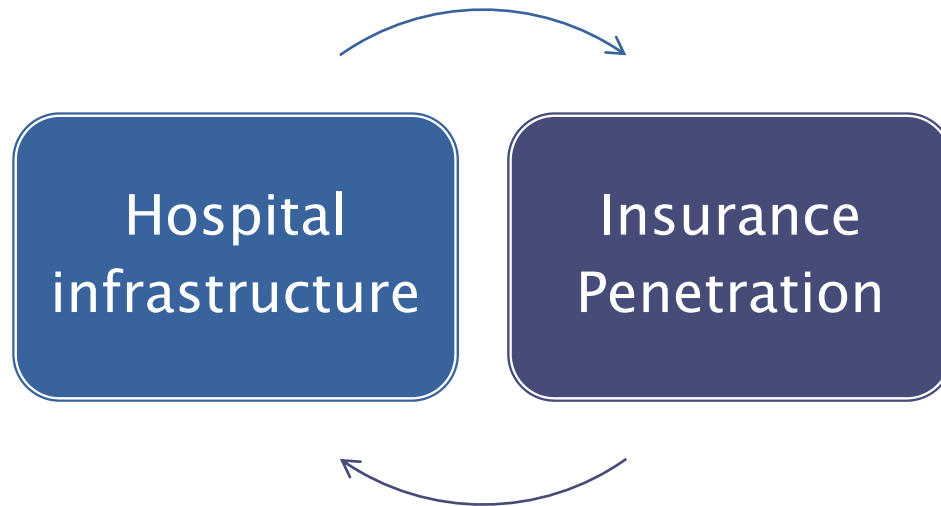
45.3%

1994

- Psychological desire: Does not exist to buy insurance. Trying to meet ends
- Strategy: Do not have one (unaware)
- Choice: Probably UHC (Government funded)
- Experience: Dependant on limited offerings. No option but to continue coverage (if Government funding continues)

The economically weaker sections of society cannot afford to buy medical insurance plans and they need to be subsidized

Application 2: Rural segment



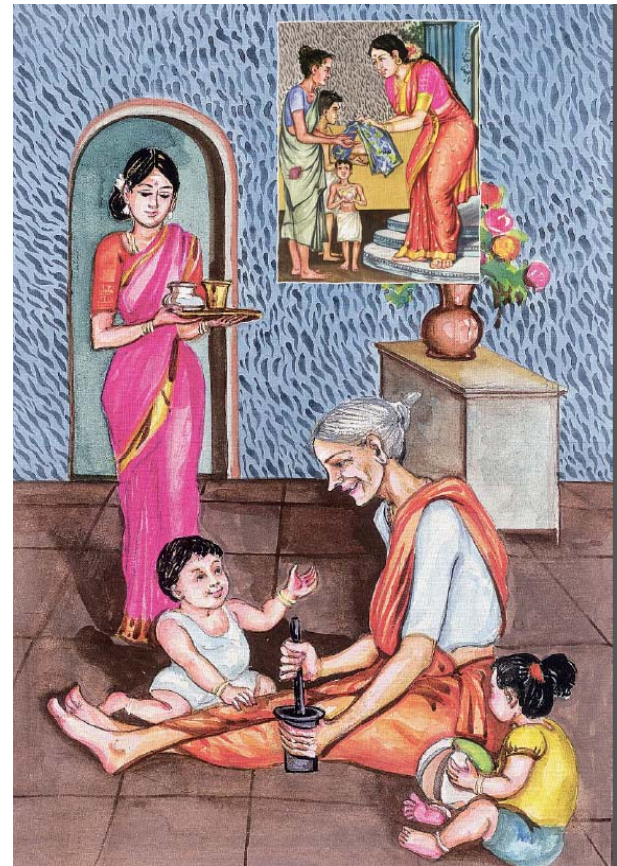
- Rural Areas: Minimal infrastructure (Travel to cities to avail insurance)
- Availability Heuristics: Individuals will use “rules of thumb” or “mental shortcuts” to make decisions rather than fully considering available information.

Insurance awareness is low. Psychological desire to buy insurance does not exist. Penetration is linked to medical care availability (infrastructure development)

Application 3: Cultural segment

- Characterized by relationships, roles and status within the social system
- An individual seeing himself/herself as inseparable from her/his network of social relations

Despite awareness of insurance, overcoming the constraints is the key to convert desire into action (i.e. the buying of insurance)



(Source: Picture from Himalayan Academy books)

Behavioural economics has the potential to solve challenging problems with simpler and efficient solutions

- Holistic selling instead of aggressive selling
- Increase trust in company services
- Servicing is branding
- Customer awareness of benefits should be improved
- Product design innovations
- Innovative distribution channels
- Customized marketing strategy

Marketing should be focused on the need (mis-selling is a disservice). It must understand constraints of not buying insurance and address these instead of pitching marketing material.

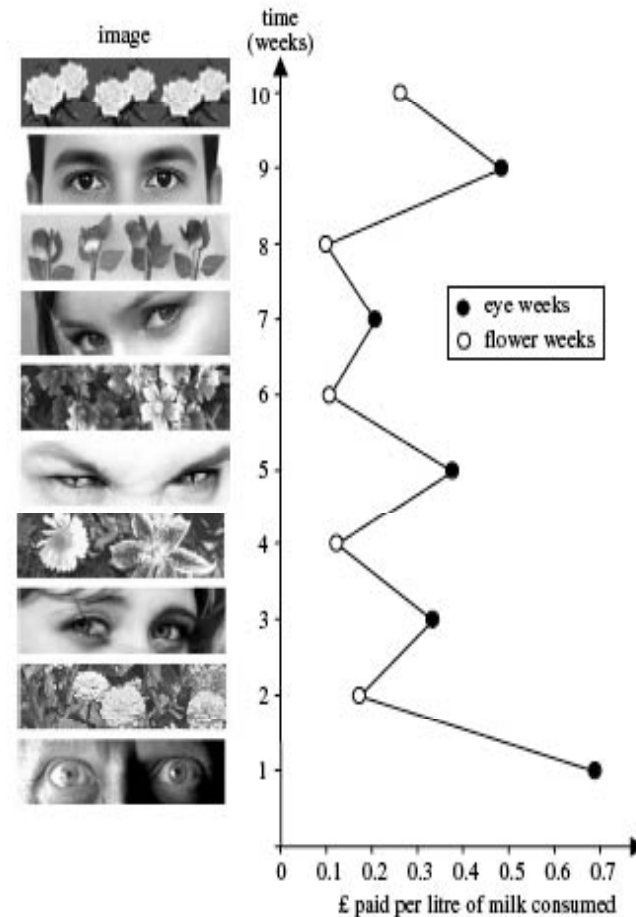
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BE findings shows that "Honesty" levels can be improved by "nudging" the environment / context

- An "Honesty box" was placed in the office kitchen of a British university
- Over a period of 10 weeks, the images shown here on the right were displayed on the box without any explanations



Ariely D (2009), Predictably Irrational – The Hidden Forces That Shape Our Decisions, Harper.
Ariely D (2012), The (Honest) Truth About Dishonesty, Harper.
Kahneman D (2011), Thinking, Fast and Slow, Penguin Books.

BE findings advocates the following changes to the Underwriting for better disclosures



- Reduce non-disclosure rates by signalling increased monitoring activities
- Highlight the benchmarking of the disclosure rates for agency force
- Highlighting the honest behavior of other agents/ customers in attempt to drive customers towards stretching the truth using the Social norm of honest behavior

UW and Claims forms: Should we sign at the top rather than at the bottom?

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BE can nudge the people to chose the right insurance levels thus providing sufficient protection

Current approach

Sum Assured: 1 Cr
Your premium is:

₹ 11,910

Annual

Policy Term: 10
Premium Payment Term: Regular

₹ 6,074

Semi-Annual

Testing approach

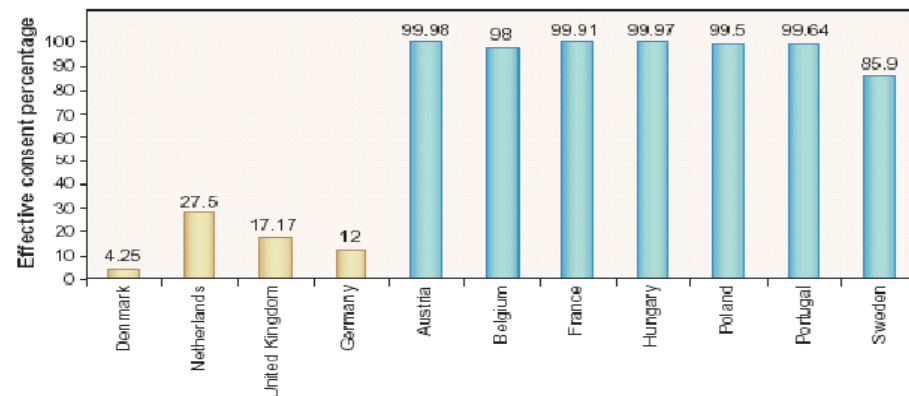
Your Cover

Based on the information provided your options are displayed below. This is currently a quick quote. To receive an exact quote please select your preferred life cover option. You will then be asked a series of health, lifestyle and occupation questions to determine your final quote.

Your Quote		
£49.88 per month	£54.17 per month	£60.37 per month
30 years, Level Term	30 years, Level Term	30 years, Level Term
Life Cover £580,000	Life Cover £600,000	Life Cover £620,000
Proceed >		

BE findings can help us design better insurance products offering right levels of protection now and future

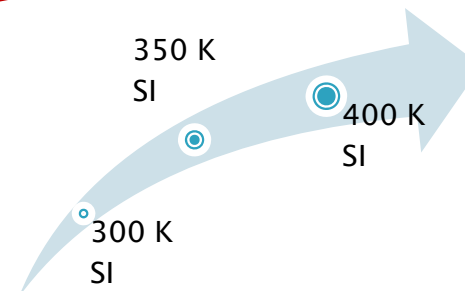
Why Such Differences In Organ Donors?



Effective consent rates, by country. Explicit consent (opt-in, gold) and presumed consent (opt-out, blue).

Current indemnity offers flat SI limits
(Benefits same)

- Medical inflation (Cost increase)
- Incomes increase



Summary: Applying Behavioural Economics in Insurance helps improve the business quality

- Behavioural economics is real
- All the projections point out to double digit growth in health insurance penetration
- Actuaries always relied on the trends, projections and modelling using the data
- Behavioural Economics can help us understand the challenges from Social, Emotional and Psychological dimensions
- As seen before, small changes can result in huge behavioural shifts
- Actuaries armed with predictive capabilities should add the BE skills to guide the Health insurance forward.



Swiss Re

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