



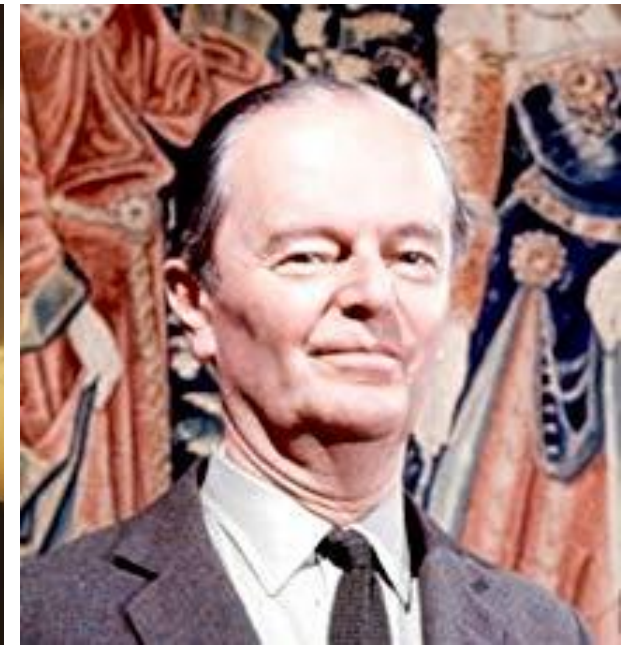
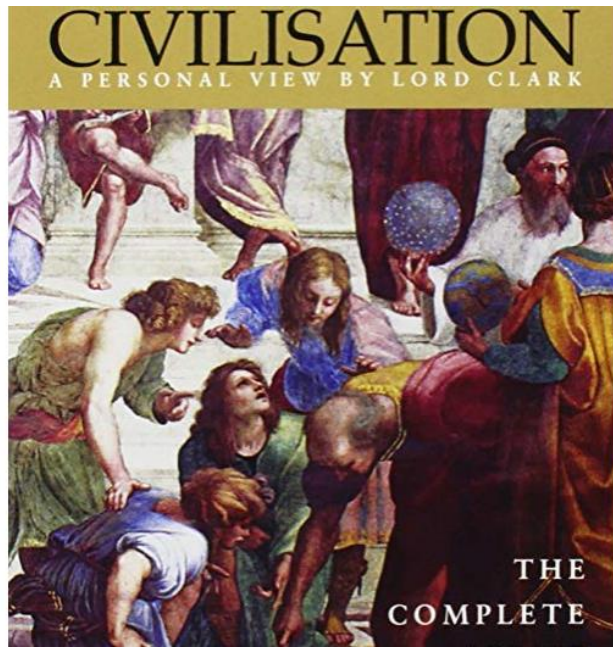
The Future of the Actuarial Profession

A personal view by Alan Watson

Yorkshire Actuarial Society – 9 October 2019

First presented - KSS Glasgow - 17 September 2019

Landmark from 1969





Agenda

- Influences
- Why now?
- What we do
- What we could and/or should do
- Opportunities
- Threats
- Summary

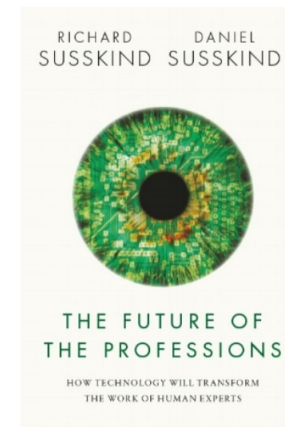


Influences

Daniel Sussskind

DANIEL SUSSKIND

The Future of the Professions: How Technology Will Transform the Work of Human Experts



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'Undoubtedly right' - *The Economist*

'Expert, original, and witty' - *The Times*

'An act of delicious iconoclasm' - *Prospect*

'Remorselessly effective' - *Financial Times*

A *Financial Times* 'Book of the Year'

A *Times Literary Supplement* 'Book of 2016'

A *New Scientist* 'Best Read of 2015'

The Future of the Professions sets out two futures for the professions. Both rest on technology. One is reassuringly familiar. It is a more efficient version of what we have today. The other is transformational - a gradual replacement of professionals by increasingly capable systems. In an Internet society, we will neither need nor want lawyers, accountants, doctors, teachers, architects, consultants, the clergy, and many others to work as they did in the 20th century.

Follow the link to Amazon...

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Total price: **£23.61**

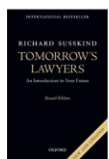
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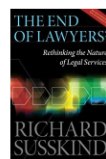
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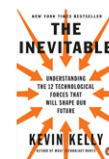
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Presented to the
IFoA twice

16 October 2017 – Panel debate in London also live streamed.

‘Can professional regulation and organisational culture prepare us better for the next financial crisis?’

1 May 2018 – Staple Inn – live streamed to EICC in Edinburgh.

‘The Future of the professions – how technology will transform the work of human experts.’

CPD learning outcome – ‘A better understanding of the issues for professions and professionals in the future.’

Tan Suee Chieh





Presented to Singapore Actuarial Society

- Navigating across paradigms
- But a shorter presentation was given at the IFoA Council Strategy day in 2018.
- Outlined
 - Where we work today
 - Possibilities for the future
 - Actuarial safe and secure box



Why now?



Why now?


Actuaries are strategic thinkers!

IFoA Council has been considering this

Actuaries do long-term planning

This is about where we are going

Where we will/could end up in 20, 30 years



Now is the right
time

DB Pension
work is
declining

DC pension
work won't fill
all the gap

Reserved roles
– declining

New
techniques

Kingman
review

Chartered
Actuary



The Paradigms


- Paradigm – (noun) something serving as an example or model of how things should be done.
- Tan Suee Chieh proposed two:
 - The world is going through unprecedented acceleration. Many fundamental assumptions about work, industry and society will change in the next 30 years. [Speed, pervasiveness and impact].
 - The world is always changing, but we have been through this before. Agricultural revolutions, and preceding industrial revolutions. And life insurance is different. [have no fear, we will be fine].

So which is it?





What we do



What skills do we have

Mathematics & statistics

Life contingencies

Compound interest

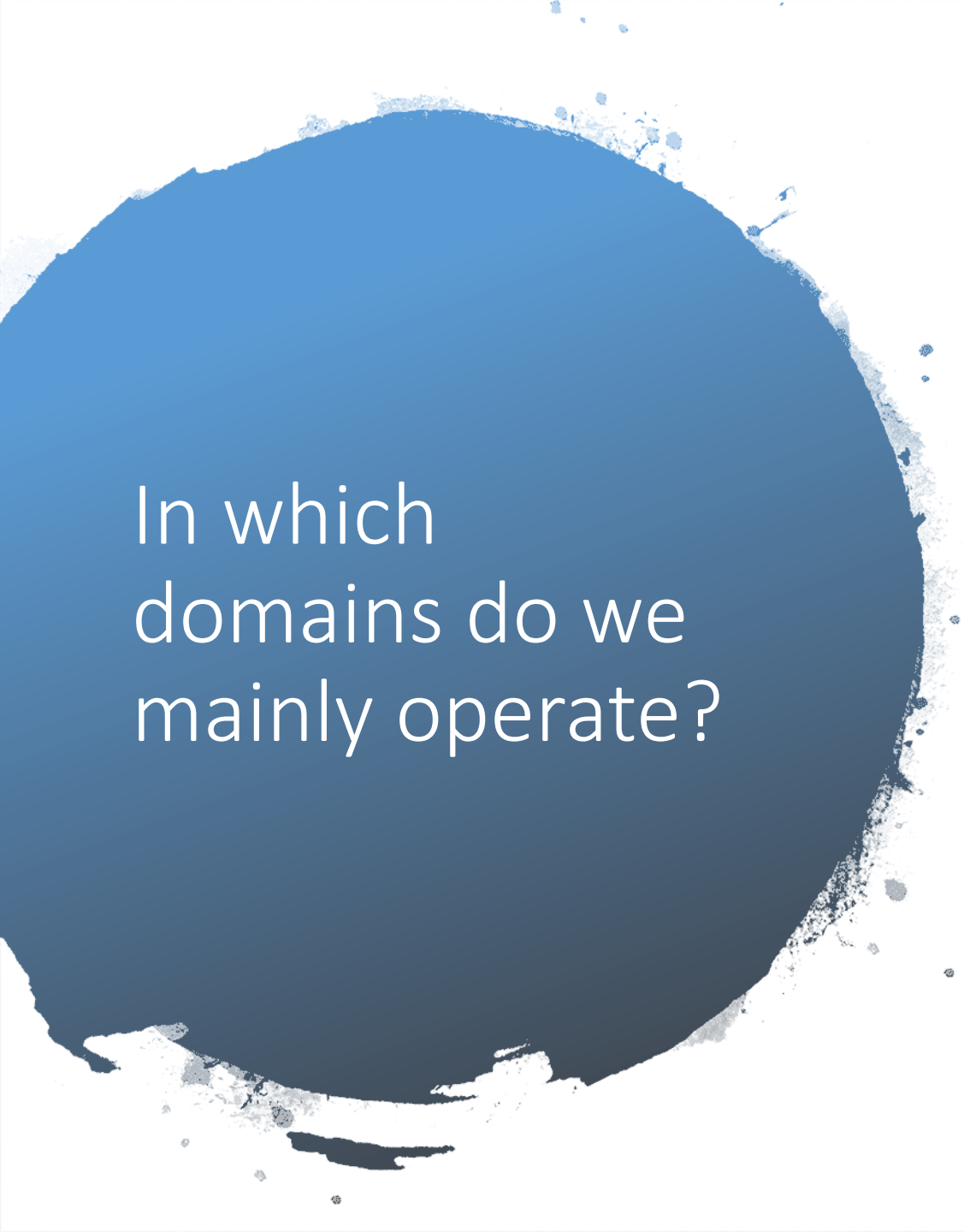
Demography

Long-term modelling

Data analysis

Economics

Investment



In which
domains do we
mainly operate?

Life insurance

Pensions

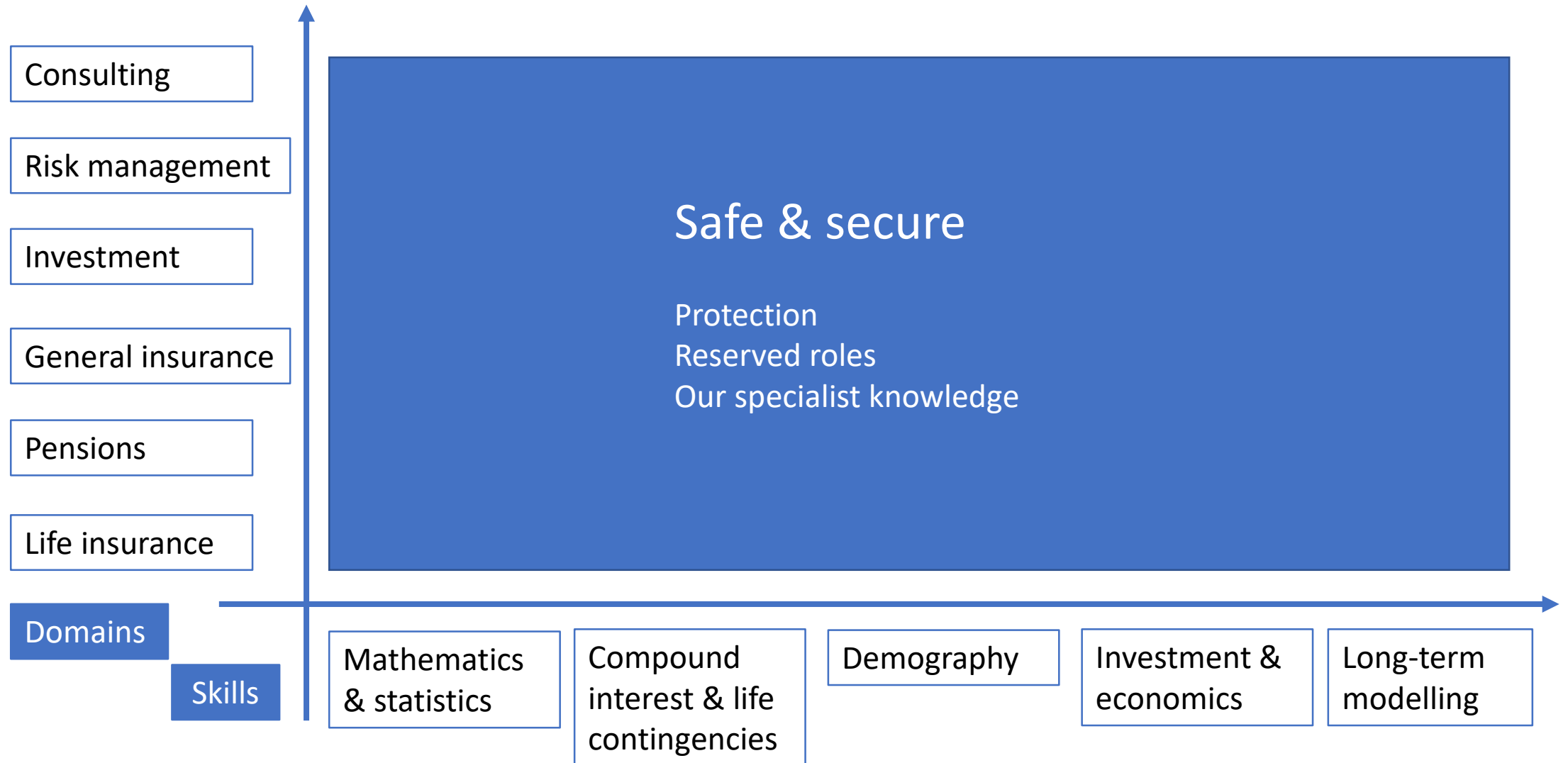
General insurance


Investment

Risk management

Consulting

Safe and secure box





What we also
have

The Actuaries'
Code

Professionalism
and ethics



What we could
and/or should do





The same as
before!

- Life contingencies
 - Compound interest
 - Long-term modelling
 - Data analysis
 - Investment
 - Economics
-
- There's nothing wrong with these
 - They will still be needed!



The new skills

Data science

Artificial
intelligence

Machine learning

Natural language
processing

Neural networks

Technology –
wearables,
Internet of things

Social networks

Multidisciplinary
approach



Opportunities



Many new
opportunities
to expand

- We can bring our skills to new areas
- We can add our professionalism and ethics
- But we will be in competition with others
- Can we communicate well?
- Do we understand the new areas?
- Do we bring insights?



Be flexible

Is Fellowship the right level?

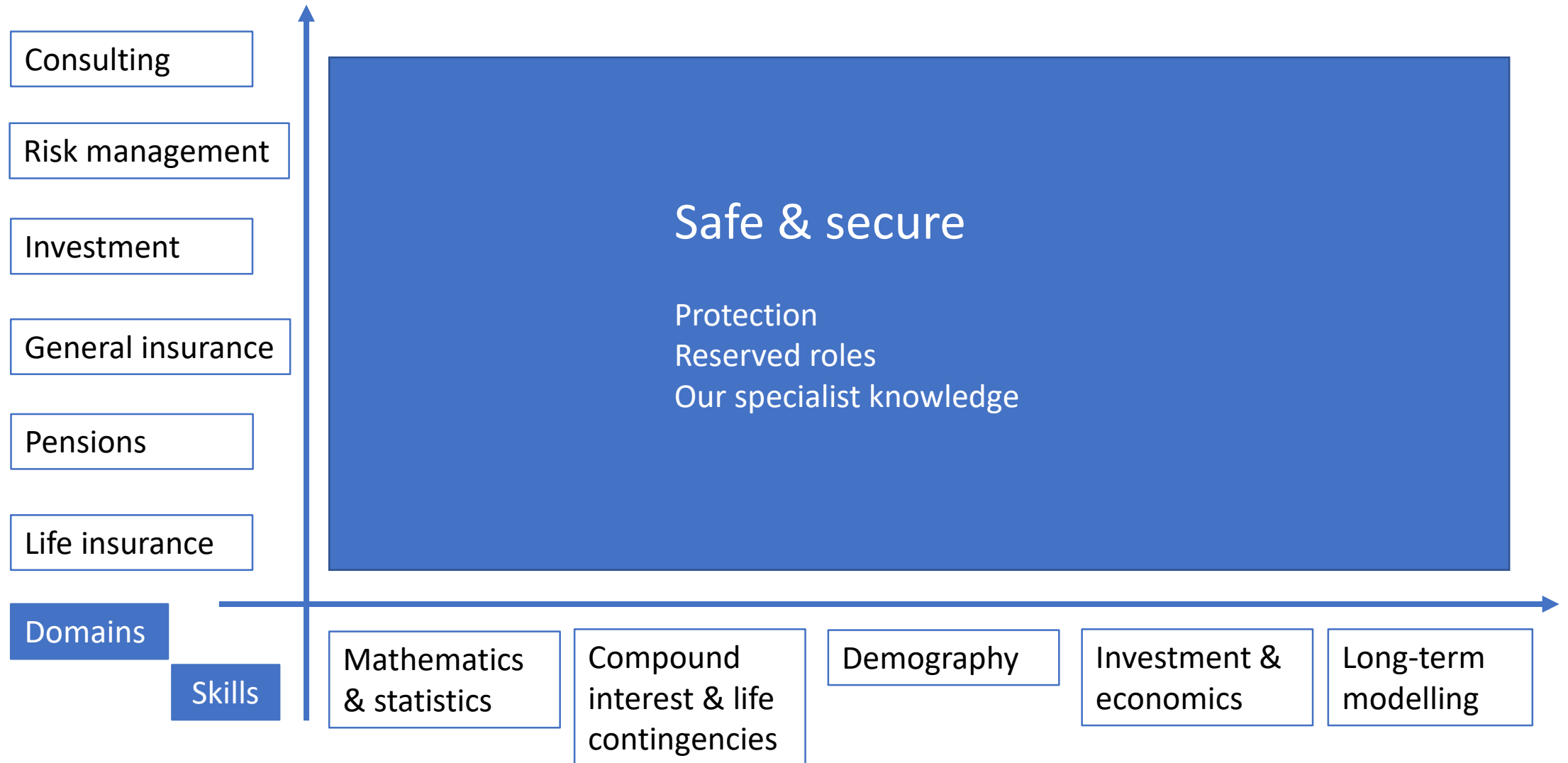
Is Associateship a better 'destination'?

We will still need Fellows

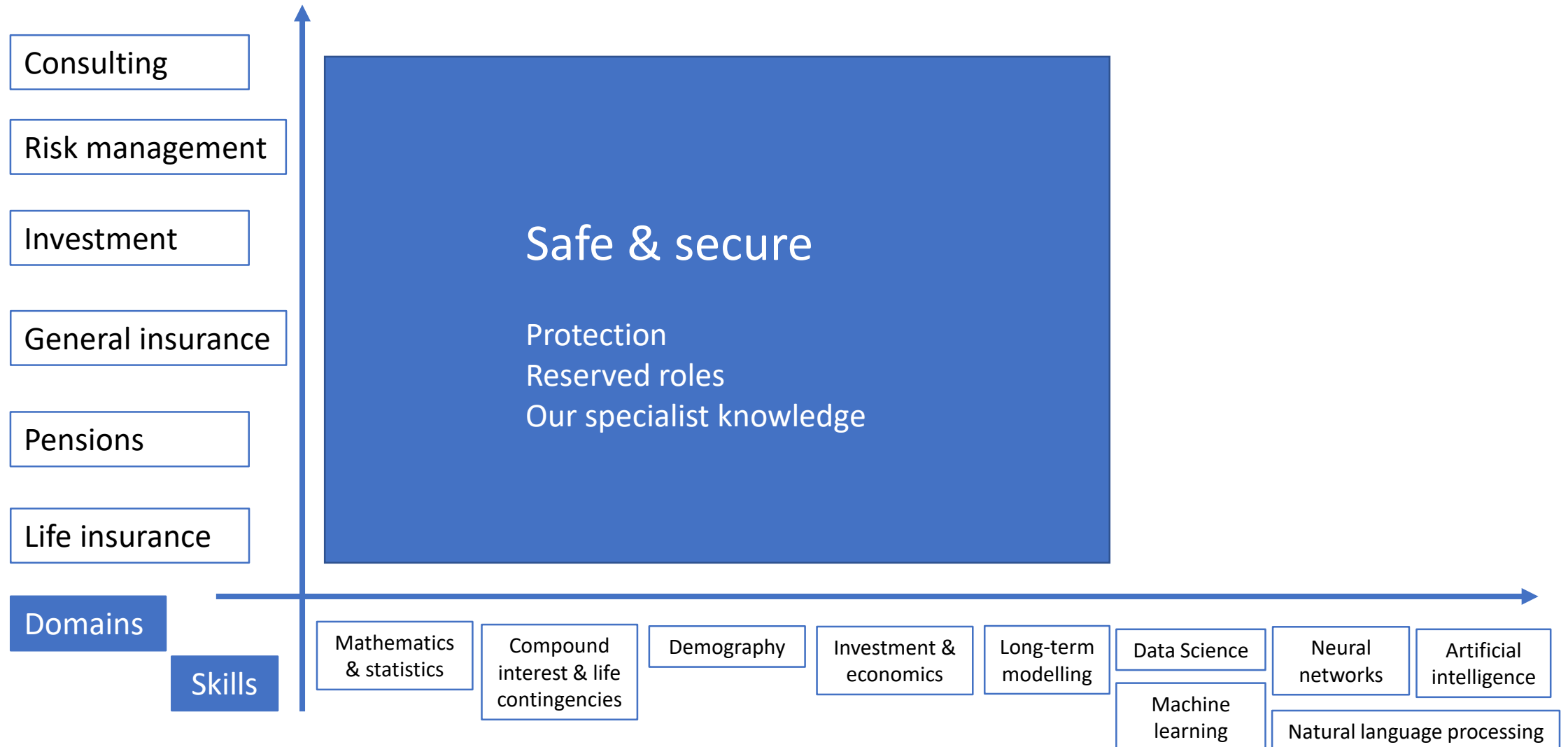
But Associates will have the key skills to become business mathematicians

Chartered Actuary proposals will return

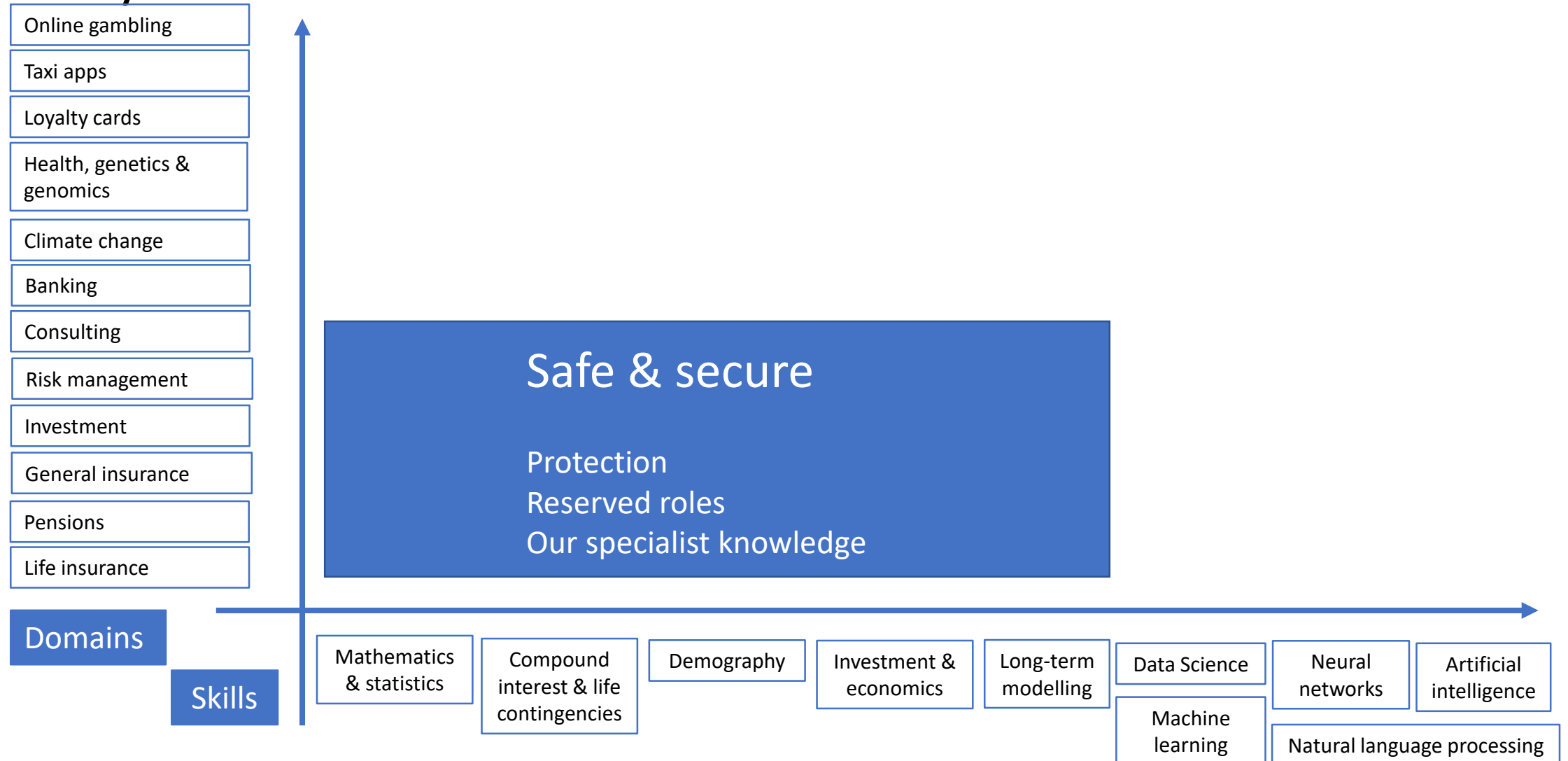
Safe and secure box



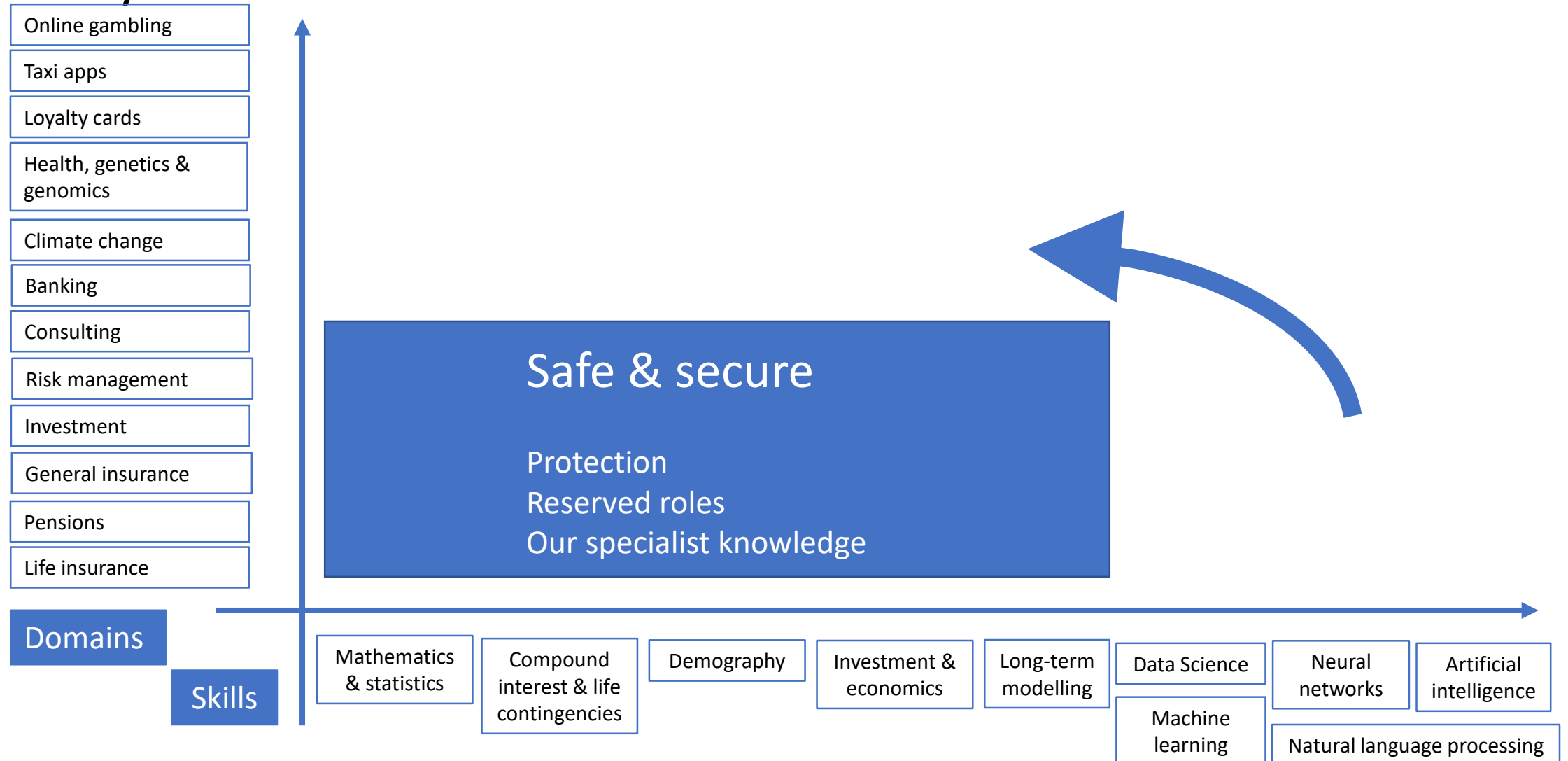
Beyond the safe and secure box



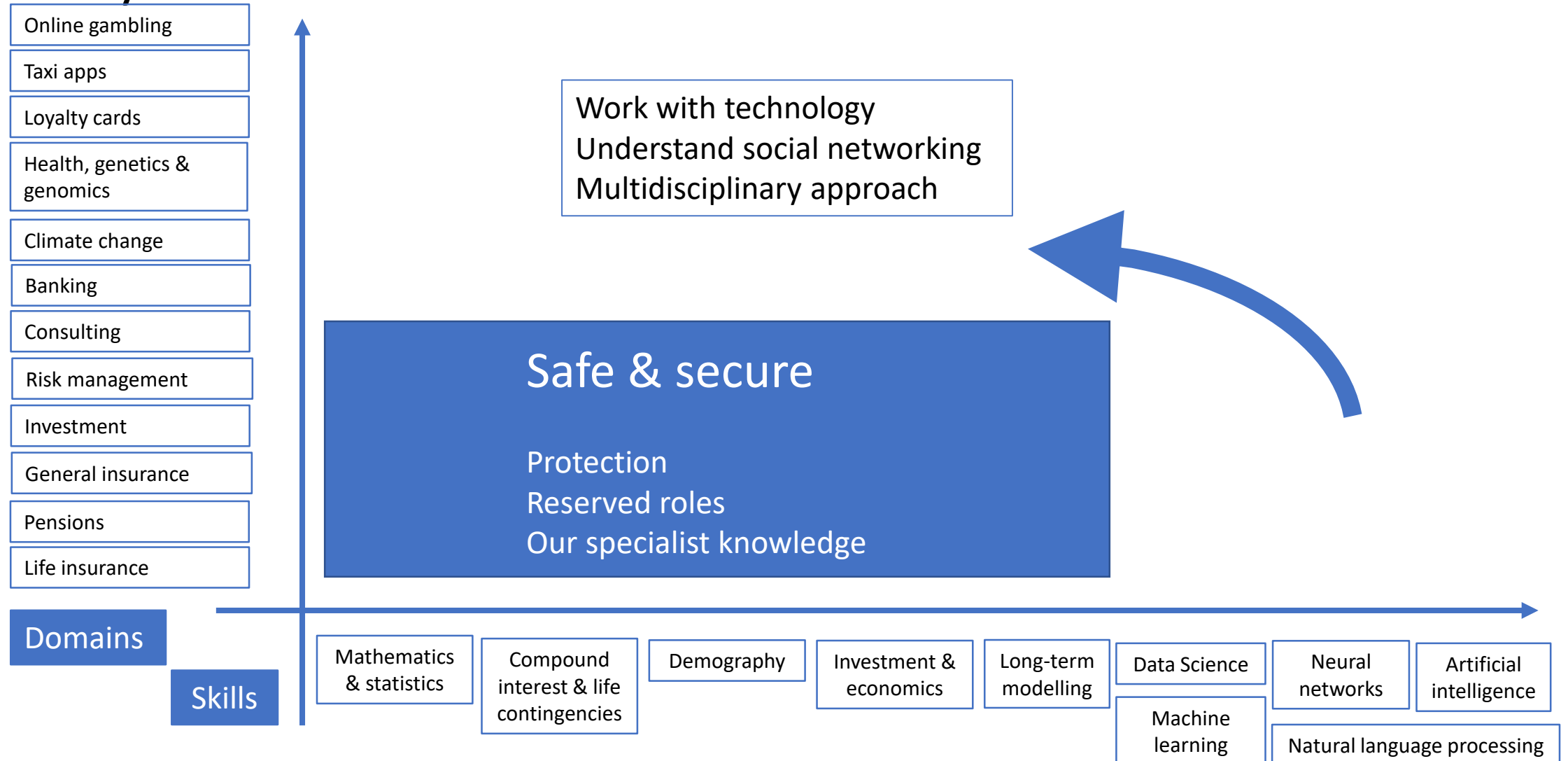
Beyond the safe and secure box



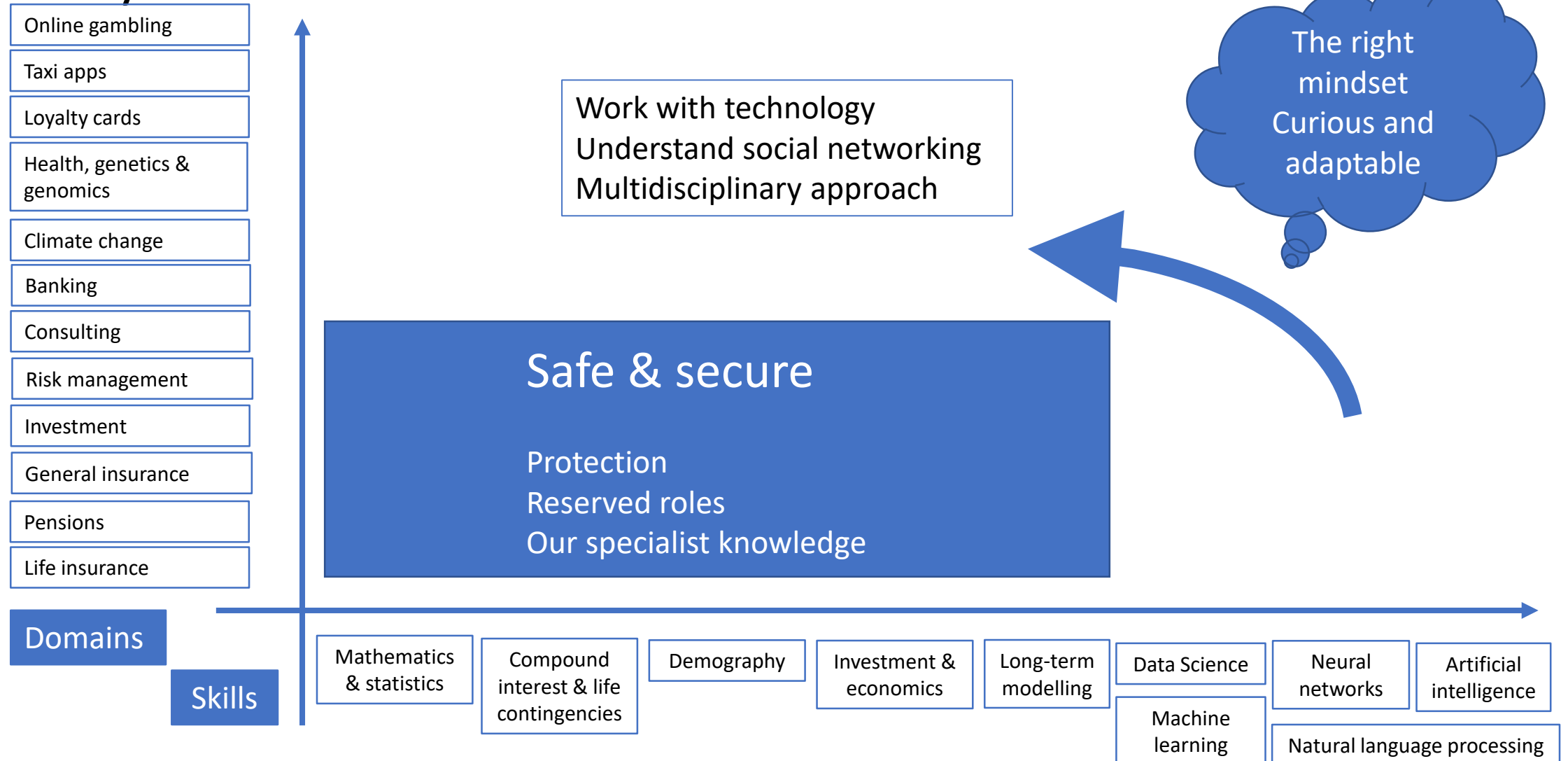
Beyond the safe and secure box



Beyond the safe and secure box



Beyond the safe and secure box





Threats



We have
competition...

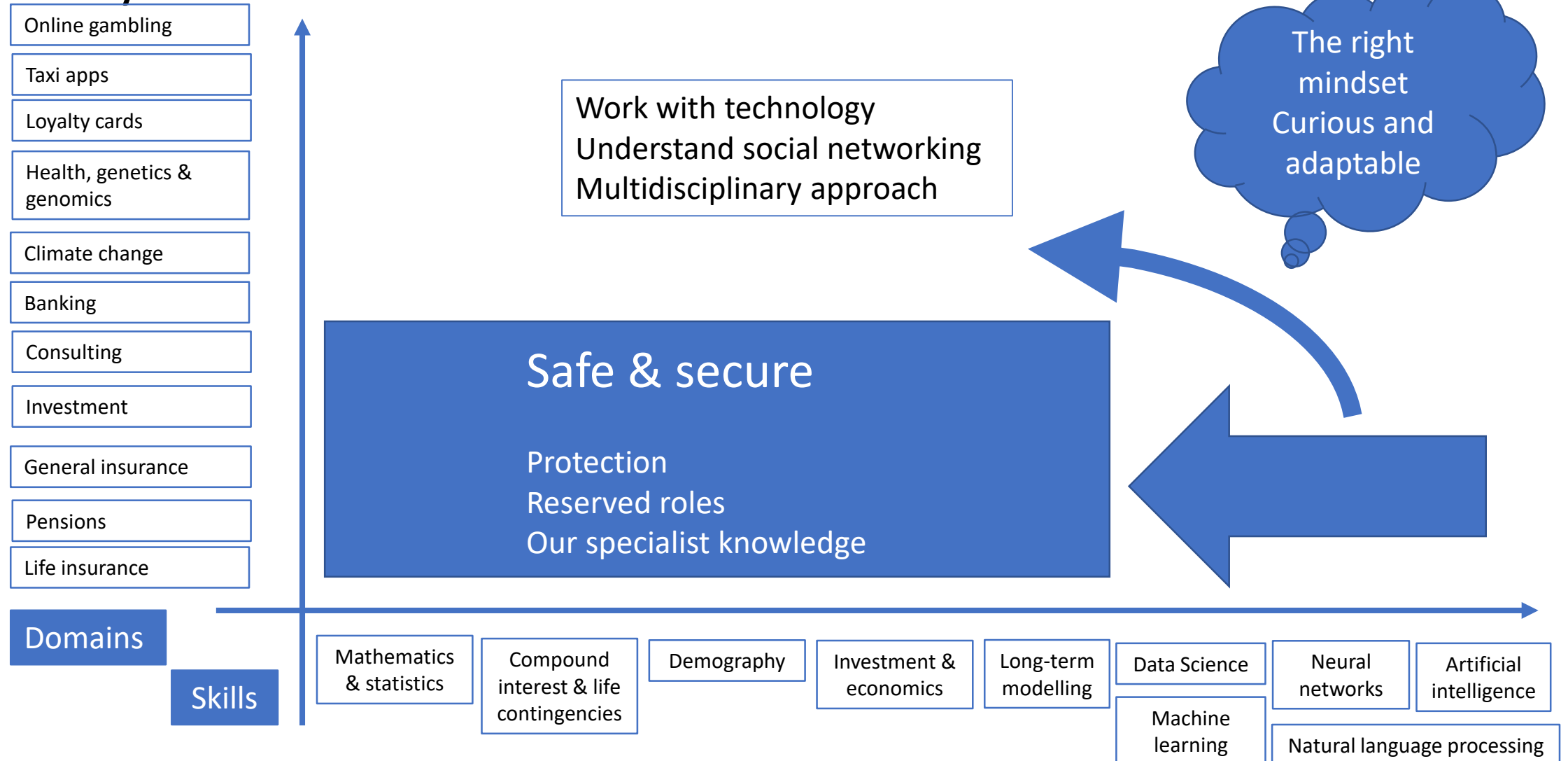
Other people do compound
interest!


Some do modelling

Some do economics

People will pick away at our
core strengths

Beyond the safe and secure box





External issues
as well

Kingman review could change
the profession

May be good and bad aspects

Actuary as a protected title?

Long-term pressure is away from
'experts' having protection



Summary



Disruption


Disruption happens all the time

It's not clear how it will manifest itself

So do you:

Choose to wait and see what happens
and deal with it

Choose to harness matters and cause
some of the disruption yourself



The only
constant thing in
life is change

Disruption is going to happen

We need to be suitably equipped to deal
with it

There will be lots of opportunities to
those who choose to equip themselves

There will be fewer opportunities for
those who don't

The safe and secure box will still exist



Questions?