



Disruption, Dolly, Dilbert & Droids: the 'D's reshaping the future of work & the contact centre.

Dr Nicola J. Millard
Principal Innovation Partner at BT
nicola.millard@bt.com
@DocNicola

BT's research and innovation



2.5bn

spent on R&D over
the last five years

3rd

largest investor in
R&D in the fixed line
telecoms sector over
past ten years

3rd

largest investor in
R&D in the UK over
past ten years




5000+

patents in
our portfolio

13k

scientists employed
worldwide



£662m

invested in R&D in
2019 / 20

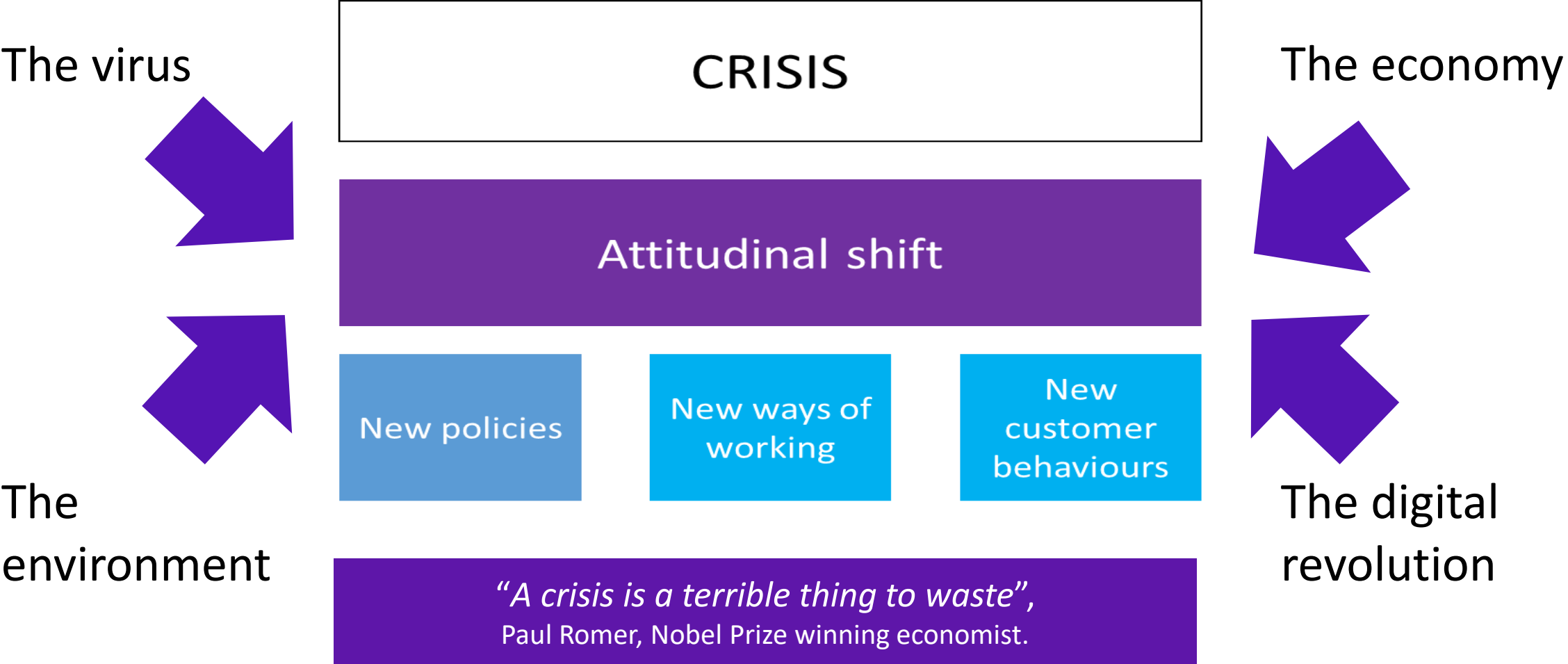
30+

direct university
research relationships

4th

highest number of
patents filed with the
European Patent Office
by a UK-based company

Disruption: why this crisis is different.



The Death of Dilbert: a view from 1992...

11 volunteer directory enquiry advisors. Cutting edge technology:

- Specially designed workstation
- Headset
- Communications control panel
- Videophone
- 2x64 Kb/s ISDN digital channels
- E-mail
- Management Information Systems (MIS)
- Electronic bulletin boards
- Storage unit/ desk

Cost per installation - £11,000!

**Operators enjoyed working at home –
more time with family & less stress.**



Results:

- Service levels improved
- Greater flexibility for peaks and troughs
- Better resilience
- Better skills retention
- Need to maintain systems
- Effective supervision vital
- The myth of the lonely and isolated teleworker – *“I’ve taken to cooking a lot more and discovered who our neighbours are”.*
- **BUT – too costly to sustain!!!**

Top tips for successful homeworking...by BT's veteran homeworkers.

1. Build a workspace that suits **you** and your environment



2. Establish a routine, **set goals** and know when to switch off



3. **Keep healthy** and don't feel guilty for taking breaks



4. **Connect with colleagues**, have virtual coffees, and re-create 'watercooler' moments



5. Make remote working less remote by **using technologies effectively**



Coronavirus accelerated digital transformation, but there is still a lot to do around culture

Technology has moved fast but culture needs to catch up:

- Trust by default
- Measure by output, not hours
- Management roles harder virtually – management by walking around no longer viable
- Onboarding, brainstorming and training more difficult digitally
- Management by checking up, and checking in
- Beware the hybrid – creating a “them” and “us” culture
- Ensure that good cultural behaviours are praised (and bad ones called out)



The death of Dilbert: the office is dead...or is it?

- Customers have been reporting **50%** or less daily occupancy across their properties
- CFOs question whether they need offices (or at least as many offices) with Gartner* suggesting that **74%** of CFOs are intending to shift some employees (between 5 and 20%) to home working
- Inequalities exposed between (typically older) home owners and (typically younger) renters/flat sharers
- Introverts & people with higher levels of agreeableness fared better than extroverts & people higher on neuroticism scale**
- Parents (especially single parents) struggled more than those without children**
- Offices will look very different with social distancing measures in place – cleaning, screening and capacity management increases costs
- Hyper-local co-working spaces likely to grow – the “15 minute city”
- Employees are most productive when being fully equipped to work from anywhere



*Gartner. (2020). CFO Actions in Response to CORONAVIRUS: Week of 30 March 2020.

<https://www.gartner.com/en/newsroom/press-releases/2020-04-03-gartner-cfo-survey-reveals-74-percent-of-orgs-to-shift-some-employees-to-remote-work-permanently>.

7 **Bernstein, Blunden, Brodsky, Sohn & Waber (2020), The Implications of Working Without Working Without an Office, Harvard Business Review, July 15

The death of **Dilbert**: what does the office/contact centre of the future look like?

Co-working



Homeworking



Work from
Anywhere
(WFA)

Office based



Activity based
working



“The assumption in most organisations previous to the pandemic that you had to seek permission to work remotely switches to you have to seek permission to work in an office” Matt Ballantine.

Home advisors: views from the front line...

I'm able to bring in extra income and with the flexibility it gives me it does not interfere with my first job as a stay-at-home mum



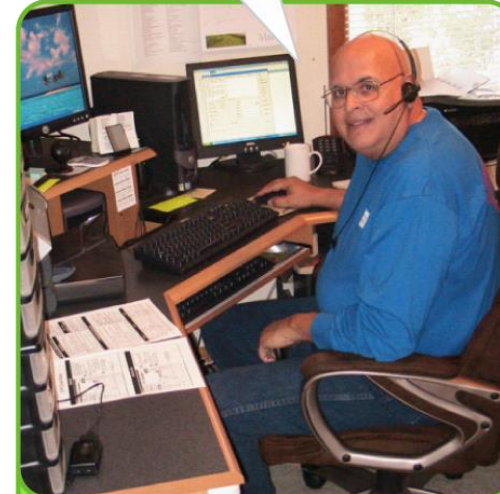
Martine

I enjoy the opportunity to work from home - the commute is short and I never have to worry about traffic!



Katie

I'm semi retired. Working from my home, part time allows me a schedule that not only supports the company but also fits with my personal schedule



Anthony

VR & AR for recruitment, remote diagnostics, training and collaboration



VR for recruitment and training

VR/AR conferencing/ collaboration

AR for remote diagnostics, training and collaboration

The Death of **Dolly**: Productivity, collaboration and wellbeing

- **Techno-overload** (“too much”): information overload and multi-tasking.
- **Techno-uncertainty** (“too fast”): work and technology changes are too fast to keep up with.
- **Techno-complexity** (“too difficult”): people are finding their technology too complex and intimidating to use.
- **Techno-invasion** (“always-on”): Pressure to be constantly available.
- **Techno-insecurity** (“paranoia”): people feel insecure in their job.



“The problem of the future will not be that we cannot connect – it will be that we cannot disconnect”,
Kevin Kelly, Wired.

Copyright: British Telecommunications PLC, 2020

Source: Tarafdar, M. Tu, Q. Ragu-Nathan, T.S. & Ragu-Nathan, B.S. (2011), Technostress: Crossing Over to the Dark Side, Communications of the ACM, Vol. 54 No. 9, Pages 113-120.

The rise of the **Droid**: what do execs think about AI and robotics?

56%

Fear the risks to job security associated with robots and AI

67%

Say it would be good to get help from AI in my job

23%

Believe that AI's biggest impact will be in the optimisation of business processes

3 in 5

Agree emerging technologies will mean people work less hard in the future

53%

Say it would be fairer if algorithms and AI agents managed people's work

37%

Agree that they would rather talk to a robot rather than their boss!

The “SuperAgents” of the future?

Sally



the ‘Swiss Army knife’ advisor

Paula



the problem solver

Natalie



the negotiator

Tony



the techie

Chris



the crowdsourced advisor

Trainers*

Explainers*

Sustainers*

* H. James Wilson, Paul R. Daugherty, and Nicola Morini-Bianzino (2017), The Jobs That Artificial Intelligence Will Create, MIT Sloan Review, 23rd March

It's not **Botman vs. SuperAgent...**

...it's **Botman + SuperAgent**

“Computers are incredibly fast, accurate and stupid; humans are incredibly slow, inaccurate and brilliant. Together they are powerful beyond imagination”

Albert Einstein (allegedly)



Thank You

Dr Nicola J. Millard
Principal Innovation Partner at BT
nicola.millard@bt.com
[@DocNicola](https://twitter.com/DocNicola)

