

@EDUCATIONGOVUK

#defenddigitalme  
#pupildata

# 20 MILLION CHILDREN'S IDENTIFIABLE PERSONAL DATA GIVEN AWAY IN ENGLAND FROM THE NATIONAL PUPIL DATABASE

## DEFENDDIGITALME

- defenddigitalme's campaign asks the UK Department for Education to change their policies to:
- protect 20 million children's identifiable confidential data in the National Pupil Database
  - stop handing out identifiable personal data to commercial third parties and press without consent
  - start telling pupils, their guardians and schools what the government does with children's personal data
  - be transparent about policy and practice

@defenddigitalme

#defenddigitalme

<http://defenddigitalme.com/>

YOUR PERSONAL DATA: £0  
YOUR PRIVACY: PRICELESS  
STOP THE EXPLOITATION



# EEMA 2017 Privacy vs Identity

GDPR in the context of children  
and education

5 July, 2017

# Privacy and children?

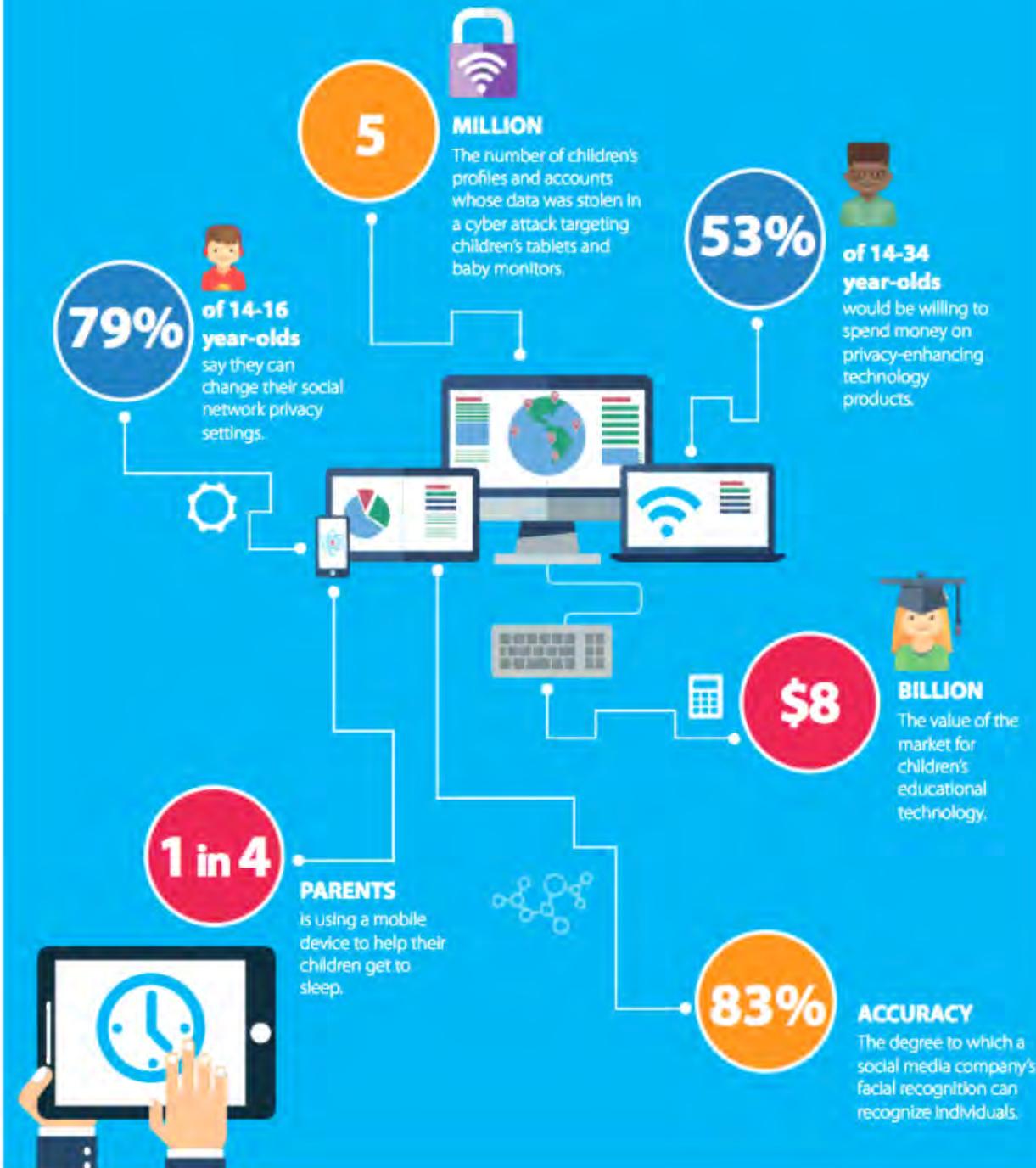
“Perhaps the most striking thing about the right to privacy is that nobody seems to have any clear idea of what it is.”

[Judith Jarvis Thomson | Keiron O’Hara reference in Seven Veils of Privacy]

# Discuss: Myths vs Evidence

- Myth busting: “Kids don’t care about privacy, they give away all their data on social media.”
- Young people use privacy settings wherever possible and still speak of disempowerment.
- GDPR supports their rights in relation to data and digital rights as set out elsewhere:
  - UN Convention on the Rights of the Child: Rights to be Heard. Rights to Freedom of Expression. Rights to Protection. Rights to Participation. And the Rights to Privacy, to Family life, and the Protection of Reputation.
  - Human Rights Act 1998 and the Data Protection Act 1998.
- i. See digital literacy work by Sonia Livingstone LSE and *EU Kids Online project*.
- ii. RAENG report *Privacy and Prejudice* young use of electronic health records (2010.)
- iii. *The Data Trust Deficit with Lessons for Policymakers* by Royal Statistical Society (2014).
- iv. UCAS survey with responses from over 37,000 Higher Education applicants. Over 90% said wanted to stay in control over who their personal data was shared with and what it was used for, and wanted to be asked for their consent before their personal data was provided outside of the admissions service. (2015)
- v. Pew Research (US) (2016).
- vi. House of Lords Report, *Children and The Internet* (2017)
- vii. Horizon Digital Economy Research Institute, *The Internet On Our Own Terms* (2017)

# CHILDREN ONLINE



# The Global EdTech context

**\$8 billion:**  
the value of the  
market for children's  
educational  
technology (EdTech)

image source: UNICEF discussion paper series  
Children's Rights and Business in a Digital World  
[https://www.unicef.org/csr/files/  
UNICEF\\_CRB\\_Digital\\_World\\_Series\\_PRIVACY.pdf](https://www.unicef.org/csr/files/UNICEF_CRB_Digital_World_Series_PRIVACY.pdf)

# UK Digital Strategy

“Education technology is one of the fastest growing sectors in the UK, accounting for 4% of all digital companies, and UK businesses have become world leaders in developing innovative new technologies for schools.”

[March, 2017]

# GDPR: Start from Recital 38

“Children merit specific protection with regard to their personal data, as they may be less aware of the risks, consequences and safeguards concerned and their rights in relation to the processing of personal data.”

impact assessment

clear privacy notices

subject access request

'information society services'

right to data portability and erasure

no solely automated profiling with significant effects

The GDPR has no definition of the age at which children are deemed to be competent, or at what age childhood ends.

# GDPR and Sensitive personal data

“The GDPR refers to sensitive personal data as “special categories of personal data” (see Article 9). These categories are broadly the same as those in the DPA, but there are some minor changes.

For example, the special categories specifically include genetic data, and biometric data where processed to uniquely identify an individual.

Personal data relating to criminal convictions and offences are not included, but similar extra safeguards apply to its processing (see Article 10).”

[ICO, 2017]

# Questions for GDPR on Consent vs Legitimate Interests?

## Article 8

1. Where point (a) of Article 6(1) applies, in relation to the offer of information society services directly to a child, the processing of the personal data of a child shall be lawful where the child is at least 16 years old. Where the child is below the age of 16 years, such processing shall be lawful only if and to the extent that consent is given or authorised by the holder of parental responsibility over the child. Member States may provide by law for a lower age for those purposes provided that such lower age is not below 13 years.

2. The controller shall make reasonable efforts to verify in such cases that consent is given or authorised by the holder of parental responsibility over the child, taking into consideration available technology.

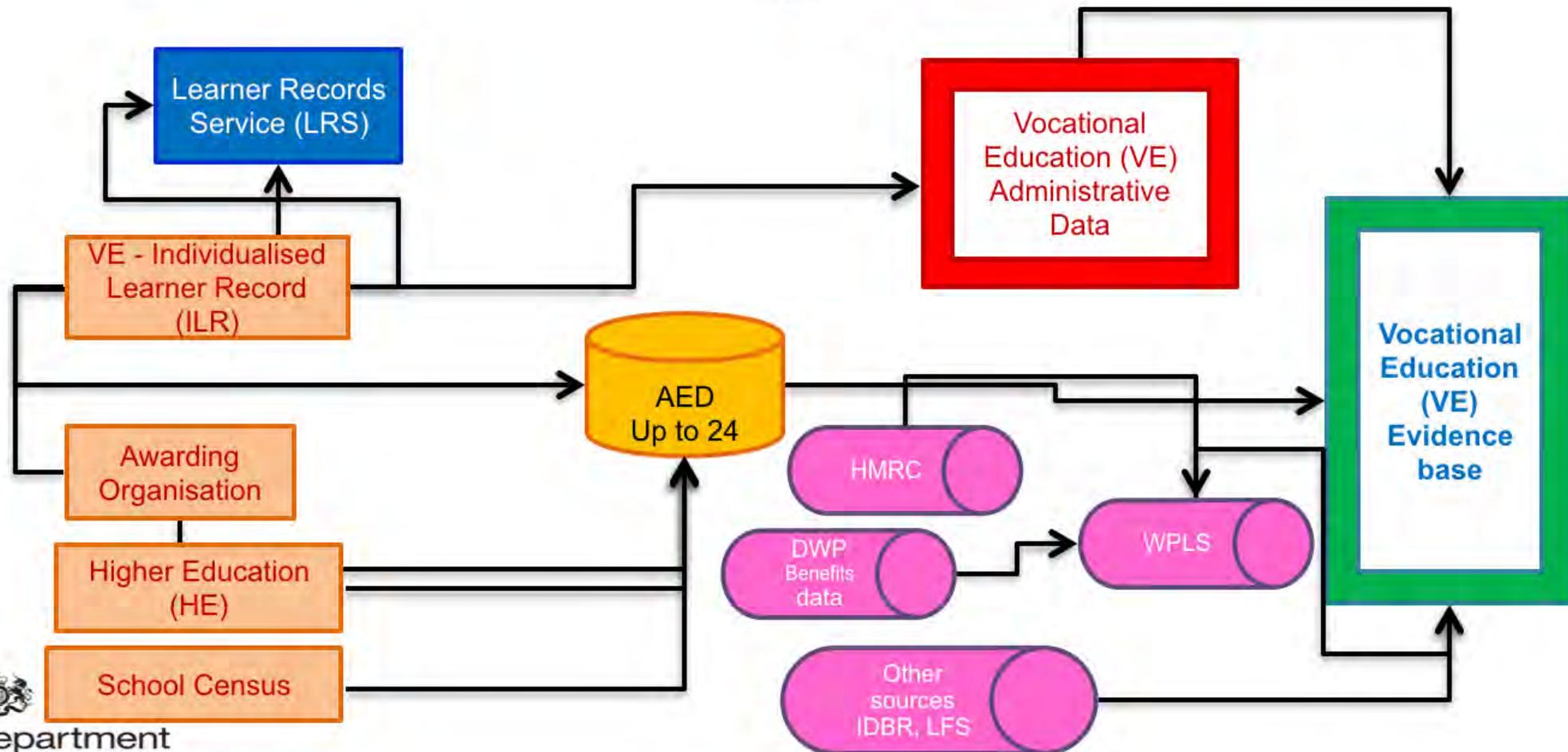
# **Data in State Education in England: Case Studies**



# Purposes of data in State Education

- Direct schooling and support
- Administration and Accountability
- School census (England: National Pupil Database ca. 23 million identifiable records)
- Public interest research
- Other 'research' purposes
- Other national and local purposes

# Longitudinal admin data: 'destinations data'



Subject

FFT Benchmark

Based on average challenge setting

Full target date

Communication, language & literacy

Search bar

Chance of each level or higher

Risk of lower level

Benchmark level

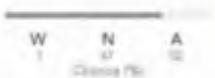
Chance of higher level

Target level

How likely?

Target reviewed?

Mathematics



48%

A-

FFTSS Average

1%

Reading



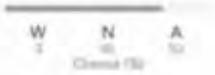
22%

A

FFTSS Average

1%

Science



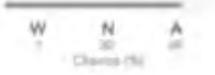
47%

A-

FFTSS Average

1%

Speaking and Listening



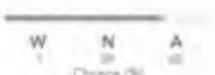
31%

A

FFTSS Average

1%

Writing



40%

A-

FFTSS Average

1%

Profiling & Predictive scoring

<b>Subtotal for section</b>	<b>24</b>
<b>Communication, language and literacy</b>	
Language for communication and thinking	9
Linking sounds and letters	9
Reading	9
Writing	9
<b>Subtotal for section</b>	<b>36</b>
<b>Problem solving, reasoning and numeracy</b>	
Numbers as labels for counting	8
Calculating	7
Shape, space and measure	8
<b>Subtotal for section</b>	<b>23</b>
<b>Knowledge and understanding of the world</b>	
Physical development	8
Creative development	8
<b>EYFS Total Score</b>	<b>107</b>

fft

Name of school

First

Term tracker

DOB and gender

Term details

Year	Term	LA	School	Entry	Lea
Reception	Autumn 2012	LA School name code		06/09/12	
	Spring 2013				
	Summer 2013				
Year 1	Autumn 2013				
	Spring 2014				
	Summer 2014				
Year 2	Autumn 2014				
	Spring 2015				
	Summer 2015				
Year 3	Autumn 2015				

# Mime Consulting

<http://defenddigitalme.com/wp-content/uploads/2017/03/MimeConsulting.pdf>

We use our proprietary data warehouse, DataHub, to process a huge range of education data.

“We use data from the NPD to track your students wherever they go within England.”

## Section 1h) Key Stage 2 (2016) - Wandsworth Demo Primary School

### vi) KS1 to KS2 Transition Matrices

Reading		Total Pupils	Key Stage 2 - Reading Test		
			Below Expected <100	Expected Standard 100 to 109	Higher Standard 110+
Key Stage 1 Reading Level	1 or Lower	7	4 (57%)	3 (43%)	0 (0%)
	2C	9	4 (44%)	4 (44%)	1 (11%)
	2B	12	2 (17%)	10 (83%)	0 (0%)
	2A	17	0 (0%)	11 (65%)	6 (35%)
	3 or higher	12	0 (0%)	3 (25%)	9 (75%)

Maths		Total Pupils	Key Stage 2 - Maths Test		
			Below Expected <100	Expected Standard 100 to 109	Higher Standard 110+
Key Stage 1 Maths Level	1 or Lower	3	3 (100%)	0 (0%)	0 (0%)
	2C	12	6 (50%)	6 (50%)	0 (0%)
	2B	11	1 (9%)	10 (91%)	0 (0%)
	2A	19	0 (0%)	8 (42%)	11 (58%)
	3 or higher	12	0 (0%)	2 (17%)	10 (83%)

Writing		Total Pupils	Key Stage 2 - Writing 1A		
			Below Expected <100	Expected Standard 100 to 109	Greater Depth 110+
Key Stage 1 Writing Level	1 or Lower	6	3 (50%)	3 (50%)	0 (0%)
	2C	12	2 (17%)	10 (83%)	0 (0%)
	2B	13	0 (0%)	12 (92%)	1 (8%)
	2A	17	0 (0%)	16 (94%)	1 (6%)
	3 or higher	9	0 (0%)	1 (11%)	8 (89%)

### vii) KS1 to KS2 Progress Scores

Subject	School		Comparisons		
	Average KS2 Scaled Score	Avg. Exp. KS2 Score	Progress Score	LA	National
Reading	105.7	102.7	+3.1	+1.4	0.0
Writing		101.3	+2.4	+0.8	0.0
Maths	106.7	103.0	+3.6	+1.5	0.0

NA/NS does not include pupils for whom KS1 prior attainment was not available or who were absent or had no sample for the KS2 tests

Note that some pupils with a scaled score may not have an expected score, and vice versa

This report tracks the outcomes of your primary school year 6 cohort from Key Stage 2 through to Key Stages 4 and 5.

We use data from the National Pupil Database (NPD) to track your students wherever they go within England. We compare the cohort against national averages as well as other students in the schools the pupils went to. The report provides insights into the relative influence of the primary school on the pupils' future outcomes.

### English Progress from Key Stage 2 to Key Stage 4

This analysis shows the English GCSE attainment of your pupils, split by their English attainment at Key Stage 2. For Key Stage 2 prior attainment, teacher assessment is used where there is no test level.

GCSE English Attainment in 2012/13, by Prior Attainment

Key Stage 2 English	Pupils	English GCSE Grade Achieved										3+ Levels of Progress		KEY		
		Not Sat	U	D	F	E	D	C	B	A	A*	A**	Domestic		National	
Disrupted/Not Assessed	0															0
Working Towards Level 1	0															0
Level 1	0															0
Level 2	6															0
Level 3	31							6	6	12	5					24
Level 4	100	12						16	12	10	10	7				158
Level 5	54	5						10	10	10	10	12				48
Total in Progress Measures	282	18						12	18	102	34	36	12			240



Data Item	Tier (1 or 2)	Reason data item required
aPMR	2	To match datasets
Major and minor ethnic group	2	Practitioners involved in this project wish to explore if there are particular ethnic groups who under- (or over-) perform, and therefore ensure support is given to ethnic groups in need.

### Section 2b) Map of Pupil Residence (Jan 2016) - Wandsworth Demo Primary School



Surrey Square School wanted to understand the impact that the

# Telegraph Newspaper

“date of birth to track progress of different age groups within a class, and postcode to track how different datasets based on address affect results”

Please select the suitable Tier which will cover all the information you are applying for.

Information Tier	Information Type	Description	Tier Requested
1	Individual pupil level data - Identifying and / or Identifiable and Highly Sensitive	<p>Individual pupil level extracts that include identifying and highly sensitive information about pupils and their characteristics including items described as 'sensitive personal data' within the UK Data Protection Act 1998.</p> <p>Examples of identifying data items include Names, Address and Date of Birth.</p> <p>Examples of highly sensitive data items include Looked After Status, In Need Status, Full Ethnicity, Full Language and Primary and Secondary SEN Type, reasons for exclusions and absence.</p>	<input checked="" type="checkbox"/>
2	Individual pupil level data - Identifiable and Sensitive	<p>Individual pupil level extracts that include sensitive information about pupils and their characteristics including items described as 'sensitive personal data' within the UK Data Protection Act 1998 which have been recoded to become less sensitive.</p> <p>Examples of sensitive data items include ethnic group major, ethnic group minor, language group major, language group minor, Special Educational Needs and eligibility for Free School Meals.</p>	<input type="checkbox"/>

The Daily Telegraph

**From:** [REDACTED]  
**Sent:** 12 February 2013 16:01  
**To:** [REDACTED]  
**Cc:** REQUESTS, NPD  
**Subject:** DMAP: Daily Telegraph Request

For info:

I have now spoken with [REDACTED] at the Daily Telegraph about their data request, which was discussed at last month's DMAP meeting. They have clarified that their aim is compare the performance of schools at the level of individual subject factoring in variations in the type of student enrolled at each school. They are not looking to compare the performance of individual teachers and have offered "cast iron assurances that no children will be identified through our use of this data".

Following this discussion they are content to receive tier 2 level data comprising the KS2, KS4 and KS5 datasets matched to the school census. We are planning on supplying them 5 years of data which they will be able to use for up to 12 months. This contrasts with their original request for all datasets for all years at tier 1 level.

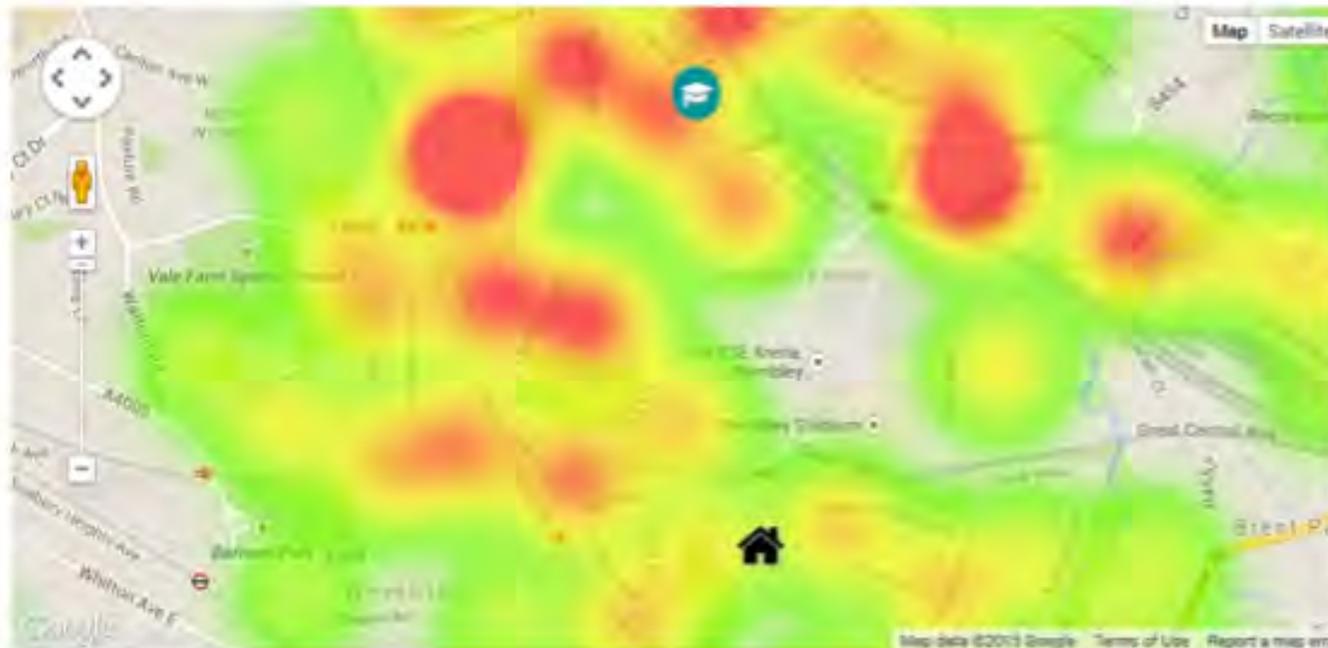
“...have offered cast-iron assurances that no children will be identified through our use of this data.” (Not could not, but would not).

# Tutor Hunt

*"Private Tutors & Personal Tutors For Home Tuition"*

The schools pages here give the parents a comprehensive guide to local schools. One feature which we are looking to add is to show a schools catchment area. We aim to implement something similar to the below heat map for each school.

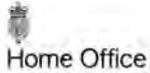
To implement this we would need pupils post code data for all schools.



Heat map key

<b>ANNA (0.2MI FROM SCHOOL)</b>	 <ul style="list-style-type: none"><li>► Location: Stockport, Cheshire I am a qualified law teacher with experience of working w... <a href="#">[more]</a></li><li>► Subjects: Law</li></ul>
<b>LY (0.4MI FROM SCHOOL)</b>	 <ul style="list-style-type: none"><li>► Location: Stockport, Cheshire Are you looking for a private tutor who teaches the life... <a href="#">[more]</a></li></ul>

NOT PROTECTIVELY MARKED



Memorandum of Understanding

Between

The Home Office

And

Department for Education

BBC Sign in News Sport Weather iPlayer TV Ra

NEWS

Home UK World Business Politics Tech Science Health Education Entert

Politics Parliaments Brexit NI Election 2017

Theresa May had plan to 'deprioritise' illegal migrant pupils

Laura Kuenssberg Political editor

1 December 2016 UK Politics

f t s Share

Leaked cabinet letters suggest that the Home Office - when it was being run by Theresa May - wanted the children of illegal immigrants to go to the bottom of the list for school places.



As seen on Twitter, May 2017 reportedly outside the Department for Education, Great Smith Street, London #BoycottSchoolCensus pupil nationality data collection and Border Force use 2016

# Building Public Trust

Safe

Fair

Transparent

Trustworthy

# What about identity?

CCTV

biometrics

VR-AR-AI-RFID

behaviour tracking

more personalised learning

classroom / BYOD Internet monitoring

interoperability with info management systems



# What about Freedom to Develop, Parental prejudices, Data Bias, Rights to Protect Reputation

“Children’s education should develop each child’s personality, talents and abilities to the fullest.”

[UN Convention of the Rights of the Child]

"It's easier to ask forgiveness  
than it is to get permission."

[Grace M. Hopper, Chips Ahoy, 1986]



“the price of innovation does not need to be the erosion of fundamental privacy rights.”

[Elizabeth Denham, The Information Commissioner  
3 July 2017, findings on Google DeepMind and Royal Free]

# Recital 39

clear  
lawful and fair  
info on identity of the controller  
access, security, and confidentiality  
fair and transparent purposes of processing  
adequate, relevant and limited to what is necessary  
risks, rules and safeguards and how to exercise rights  
processing time limited to a strict minimum, with review  
data accuracy matters, and should be rectified or deleted

# GDPR Article 4 (11) definition of consent

“freely given, specific, informed and unambiguous through affirmative action.”

But can holders of parental responsibility give 'consent' or simply approval?

What happens when children reach maturity and at what age?

Can children give informed consent at all?

What happens in the classroom if public authorities cannot rely on consent and are edTech tools enforceable or only the necessary and proportionate data for the purpose?

Conflicts with fundamental rights and freedoms? [Article 6(1)(f)]

# Age verification: GDPR

How will Article 8 work in practice in the UK?

At what age?

What are “reasonable efforts”?

How will orgs achieve verification AND data minimisation?

Will there be overlap in age verification oversight of policy and practice between the Digital Economy Act and the GDPR?

# Age verification: Digital Economy Act

*“DCMS’s factsheet suggests that, in the context of payment service providers, the age-verification regulator will “work with [those providers] to enable them to withdraw their services from infringing sites”.*

[Neil Brown <https://decodedlegal.com>]

# Preparing for the General Data Protection

## Regulation (GDPR) 12 steps to take now

1

### Awareness

You should make sure that decision makers and key people in your organisation are aware that the law is changing to the GDPR. They need to appreciate the impact this is likely to have.

2

### Information you hold

You should document what personal data you hold, where it came from and who you share it with. You may need to organise an information audit.

3

### Communicating privacy information

You should review your current privacy notices and put a plan in place for making any necessary changes in time for GDPR implementation.

4

### Individuals' rights

You should check your procedures to ensure they cover all the rights individuals have, including how you would delete personal data or provide data electronically and in a commonly used format.



5

### Subject access requests

You should update your procedures and plan how you will handle requests within the new timescales and provide any additional information.

6

### Lawful basis for processing personal data

You should identify the lawful basis for your processing activity in the GDPR, document it and update your privacy notice to explain it.

7

### Consent

You should review how you seek, record and manage consent and whether you need to make any changes. Refresh existing consents now if they don't meet the GDPR standard.

8

### Children

You should start thinking now about whether you need to put systems in place to verify individuals' ages and to obtain parental or guardian consent for any data processing activity.

9

### Data breaches

You should make sure you have the right procedures in place to detect, report and investigate a personal data breach.

10

### Data Protection by Design and Data Protection Impact Assessments

You should familiarise yourself now with the ICO's code of practice on Privacy Impact Assessments as well as the latest guidance from the Article 29 Working Party, and work out how and when to implement them in your organisation.

11

### Data Protection Officers

You should designate someone to take responsibility for data protection compliance and assess where this role will sit within your organisation's structure and governance arrangements. You should consider whether you are required to formally designate a Data Protection Officer.

12

### International

If your organisation operates in more than one EU member state (ie you carry out cross-border processing), you should determine your lead data protection supervisory authority. Article 29 Working Party guidelines will help you do this.