

# SIPHER Consortium Response

## Title of consultation

Indices Futures: Updating the English Indices of Deprivation (IoD)

## Name of the consulting body

Department for Levelling Up, Housing and Communities (DLUHC).

## Link to consultation

<https://www.gov.uk/government/consultations/indices-futures-updating-the-english-indices-of-deprivation-iod-consultation/indices-futures-updating-the-english-indices-of-deprivation-iod-consultation>

## Date of submission

23 September 2022

## Our consultation response

### Overview

#### Q.1 - How do you make use of the Indices of Deprivation in your work?

SIPHER is a consortium of academics, policymakers and practice organisations. We aim to support a shift from ‘health policy’ to ‘healthy public policy’, by understanding the relationships between wider (traditionally non-health) public policies and health outcomes. SIPHER researchers use the Indices of Deprivation alongside many other sources of data in the construction of synthetic datasets and systems models which we are developing to analyse the likely effects of different policy interventions on a range of health and wellbeing outcomes across the population. We are working directly with policy organisations to deliver novel evidence of the cost and benefits of the complex, inter-linked and long-term consequences of policy decisions. Our policy colleagues in Sheffield City Council (SCC) use IoD data to develop a deeper understanding of neighbourhoods and wards, and their relative levels of deprivation compared to each other and how the city as a whole compares to other areas. Domain specific data - especially IDACI and IDAOPI - is used to inform the work of different services within the organisation, and overall IMD rank is used as the basis for some funding decisions to ensure that deprivation and need is taken into account where that is relevant. Our policy colleagues in Greater Manchester Combined Authority (GMCA) use IoD data in several ways. Firstly, the information is used as part of understanding deprivation in the area in more detail, and to compare areas in Greater Manchester to other areas around the country. The data is used to provide context to other data. For example, identifying how deprivation correlates or aligns with other data such as obesity, unemployment, crime, business development, housing provision, or greenspace. The data are also used as part of calculations for other tools and analysis. One example of this is using LSOA deprivation deciles as an indicator in a Digital Exclusion Risk Index tool, to identify areas that are most at risk of being digitally excluded.Finally, the deprivation indices are used as part of operational decision making – for example, targeting activity in more deprived areas, or funding organisations specifically based or working in more deprived areas.

#### Q.2 - Do you make use of individual domains, supplementary indices, the combined IMD measure or a combination thereof?

All measures

#### Q.3 - How would any change to the Indices methodology, the indicators used, or the overall IMD measure potentially impact on your work?

We recognise that a good degree of consistency over time is key to the usefulness of the IMD measures. If different indicators are used then comparability across years may be compromised. We would however encourage you to consider reviewing the evidence in relation to the relative weighting of domains and their relative contribution to the full index as the importance of these will have changed significantly over time. Following any methodological changes it should still be possible (and would be desirable) to report the indices in the old and new methodologies for a few overlapping waves to provide comparability. Each change may have different impacts on our work. From the perspective of our policy partners in GMCA changes to the methodology would likely impact the calculated level of deprivation in different areas, and thereby impact on how funding is assigned to different areas. Changes to the indicators or methodology might also change how we utilise the data in our modelling. For example, the data used currently does not take account of internet connectivity in an area. If it did so, the indices might be used more from a digital inclusion perspective.

### Method

#### Q.1 - Do you have any general comments regarding the methodology used to construct the Indices or the overall IMD measure?

We would like to see clearer information accompanying each release explaining how and why the different weightings for each domain are developed. Similarly, there needs to be an explanation of why there are seven domains, and not any other number.

The sources of the current set of weights are rather dated: PSE 1998/99, government spending 2003-4, DCE survey 2006. Given the global financial crisis 2008, the UK austerity 2010-2019, the Covid-19 pandemic 2020- , and the cost-of-living crisis 2022, we could question the appropriateness of those weights. Provided the data on the indicators are available, applying different weightings is a matter of sensitivity analysis, so arguably lower priority than getting the indicators right.

#### Q.2 - Do you have any general comments regarding the criteria used to select datasets for inclusion in the Indices?

The criteria of ‘up-to-date' does not immediately apply to all datasets. In the last iteration of the indices, data used included Census 2011 data (which is updated only every ten years) as well as data that was, at the time, 4-5 years old, even though it had been updated since – e.g. adults and children in income support families. This should be more stringently applied. Further criteria should be considered, including: administrative or count data chosen above modelled data.

#### Q.3 - Would greater harmonisation across the UK nations individual Indices releases be useful or of interest to you?

Not Answered

*If 'Yes', how?:*

Yes, having consistent indices in terms of data, domains and date, would be useful to enable comparative analysis across the UK. Currently researchers who wish to take a holistic approach to UK research/policy have to use different datasets and/or make some ad-hoc assumptions about how to compare the different indices. This is sub-optimal and leads to inconsistencies in analysis.

*Rank Q.1 - Please rank the following factors in priority order according to your needs (1 being highest priority and 5 being lowest of those listed)*

Robustness of outputs: 1

Timeliness of release: 2

Range of outputs: 3

Interactive resources: 4

Detailed documentation: 5

### Income Deprivation Domain

#### Q.1 - How do you use this domain or the supplementary domains affecting children (IDACI) or older people (IDAOPI)?

Our policy colleagues in GMCA have mapped and analysed the rankings and produced briefings to show the differences between areas. The income domain is chosen the most amongst the seven domains when analysis is required. The IDAOPI has also been used to highlight areas where there is likely to be a high proportion of older people entitled to Pension Credit (and possibly where Pension Credit uptake may be low) so as to focus publicity in these areas.

#### Q.2 - Are there any changes that could be made to this domain?

In relation to IDACI, we would not suggest any particular changes to the domain, and recognise its established role in important national processes in its current form (e.g. schools and high need funding formulae). However, we believe that a guidance / advisory note would be useful for IMD users, for example in helping users understand when it may be more appropriate to use IDACI for local analysis vs other established metrics also released by government departments (notably the Children in Low Income Families release from DWP).

#### Q.3 - Would changes to the methodology or data indicators used to construct this domain affect your use of it?

Not to any significant extent.

#### Q.4 - Are there other indicators or data sources you think could be explored to measure this domain of deprivation?

The indicators are derived from counting individuals receiving benefits however we are particularly interested in the prevalence of low income households where no one is in receipt of benefits. Adding an indicator on low paid employment income such as those on the minimum wage would be very useful to us.

#### Q.5 - Data measuring Income and Employment deprivation has been produced across England and Wales, using a consistent methodology. Is this something you have made use of?

No

### Employment Deprivation Domain

#### Q.1 - How do you use this domain?

This domain is useful for small area analysis (e.g. council ward level). The concept of “ employment deprivation” is complex, as it blends employed and unemployed people who are in receipt of a range of different benefits. Explanatory information that notes directions of causation would be helpful. For example, deprivation could occur due to a person having caring responsibilities and so not being able to work. It could also occur due to unemployment being high. This conceptual blurring needs expanding on in explanatory notes.

#### Q.2 - Are there any changes that could be made to this domain?

Any changes to address the conceptual blurring described above would be helpful in enabling the use of the domain for larger area analysis.

#### Q.3 - Would changes to the methodology or data indicators used to construct this domain affect your use of it?

Not to any significant extent.

#### Q.4 - Are there other indicators or data sources you think could be explored to measure this domain of deprivation?

As with the income domain the variables in the domain relate to those on benefits but there will be others experiencing deprivation that are on low paid employment. This group needs to be captured too to get a more complete picture. For example in some households the main earner may have to take on multiple part-time jobs in order to earn enough to make ends meet. Similarly, there are others who work part time because they caring responsibilities the rest of the time for which they may not receive any benefits. It would be worth considering how these nuances could be better reflected within this domain.

#### Q.5 - Data measuring Income and Employment deprivation has been produced across England and Wales, using a consistent methodology. Is this something you have made use of?

No

### Education, Skills and Training Deprivation Domain

#### Q.1 - How do you use this domain?

This isn’t currently a focus of our SIPHER work however our policy partners use this domain in their wider work.

### Health Deprivation and Disability Domain

#### Q.1 - How do you use this domain?

We use the domain to understand inequalities in health at small area level.

#### Q.2 - Are there any changes that could be made to this domain?

Whilst acknowledging that comparability over long stretches of time are important, we believe that the health deprivation domain would benefit from incorporating a wider range of outcomes. Aspects to consider are (A) outcomes related to fertility (i.e. standardised rate of births with low birth weight) and (B) outcomes related to substance abuse (i.e. standardised rate of drug and/or alcohol-related deaths or standardised rate of drug and/or alcohol-related hospital admissions).

Information on suicide as it is incorporated now will only ever be reflective of mortality as an endpoint and will predominantly capture men. In contrast to this, information on non-lethal health outcomes and/or a combination of lethal and non-lethal outcomes might provide a better picture of gender related variations.

We also note that neither fertility nor substance abuse are captured in the English Version of the IMD, while this is common practice in its Scottish equivalent.

#### Q.3 Would changes to the methodology or data indicators used to construct this domain affect your use of it?

We would like to be able to make use of the ‘Comparative Illness and Disability Ratio’ indicator from this domain, however the documentation leaves us unsure as to how it is calculated.

Paragraph 4.6.8 of the Technical Report says that the indicator is ‘directly age and sex standardised’. However, it goes on to say that it compares ‘the actual number of benefit recipients in an area to what would be expected’. This, and the use of the term ‘Ratio’, is much more suggestive of indirect standardisation.

The equivalent indicator in the Scottish Index of Multiple Deprivation is described as an ‘indirectly standardised ratio’ (see p31 of the current SIMD Technical Report). Page 7 of the 2006 SIMD Technical Report states that the Scottish indicator switched from direct to indirect standardisation in 2006.

We would like to know if the English indicator also switched from direct to indirect standardisation at some point in the past? If so, could this be reflected in the next version of the guidance notes?

#### Q.4 - Are there other indicators or data sources you think could be explored to measure this domain of deprivation?

While years of life lost is good at measuring trends in premature mortality over time, since Indices of Deprivation are not meant to be used to compare over time, it might instead make sense to measure indicators that predict future premature mortality.

* Some of the key “ health protection” metrics are:
* Smoking prevalence;
* Prevalence of overweight and Obesity in adults and children;
* Adults and children who are physically inactive;
* Hospital admissions due to Alcohol;
* Population vaccination cover, chiefly MMR and Flu vaccinations; and
* A modelled health protection score, similar to the Anxiety and Mood disorder score.

### Crime Domain

#### Q.1 - How do you use this domain?

This isn’t currently a focus of our SIPHER work however our policy partners use this domain in their wider work.

### Barriers to Housing and Services Domain

#### Q.1 - How do you use this domain?

Our policy colleagues in GMCA use elements of the domain to measure and monitor strategies and policy. The elements used most frequently are housing affordability at a local authority level and homelessness.

#### Q.2 - Are there any changes that could be made to this domain?

For homelessness and housing affordability we would like to understand in more detail how these are developed at a LSOA level and the data sources. For homelessness specifically it would be useful to understand how the H-CLIC data will be used. For housing affordability we have concerns about the quality of the private rental statistics collated by ONS and the ability to provide granular level data.

#### Q.3 - Would changes to the methodology or data indicators used to construct this domain affect your use of it?

Not to any significant extent.

#### Q.4 - Are there other indicators or data sources you think could be explored to measure this domain of deprivation?

It would be useful if the domain was able to look at access to broadband.

### Living Environment Deprivation Domain

#### Q.1 - How do you use this domain?

We don’t use it extensively as an individual domain.

#### Q.2 - Are there any changes that could be made to this domain?

Yes, an inclusion of green space in the outdoors sub-domain would be helpful, and may enable us to make greater use of this domain. Access to, and quality of, green space is of interest to the work we do. During the ongoing cost of living crisis “ houses without central heating” might not be the best of indicators to use as some households will not be able to afford to use the heating or not as much as previously.

#### Q.3 - Would changes to the methodology or data indicators used to construct this domain affect your use of it?

Yes, our policy colleagues in GMCA have noted that the modelled data on housing in poor conditions produced some results they were not expecting for some parts of Greater Manchester i.e. more affluent areas falling within more deprived deciles. Also, lack of central heating might not necessarily mean a household is deprived. It is for example becoming increasingly popular to have log burners and generally these would be in those households that can afford them but they might be categorised as not having central heating. Furthermore, housing standards in public sector housing tend to be better than in some parts of the private rented sector. However, those in the less well maintained private rented sector may be able to afford the slightly higher rents (all be it for a lower standard of property) – some lower income households in the public sector in the better housing would therefore not be captured as deprived under the housing in poor condition variable.

#### Q.4 - Are there other indicators or data sources you think could be explored to measure this domain of deprivation?

Possibly, "Persons per bedroom" from the 2021 Census could be used as a further indicator of overcrowding. It would also be useful to incorporate data from Energy performance certificates of buildings and an indicator on quality of life such as distance to a park, woodland, greenspace etc

### Outputs and Dissemination

#### Q.1 - Which tools and outputs do you make most use of?

Data tables in Excel, The IoD2019 Postcode Explorer, The standardised IoD2019 Local Authority Maps

#### Q.2 - Which geographic scale of data best meets you needs?

Lower-layer Super Output Area (LSOA)

#### If 'Other' please specify :

Ward level

#### Q.2.1 - Which summary measures of aggregated Indices data do you make use of in your analysis? Please select all that apply

* Average rank - Population weighted average of the combined ranks for the LSOAs in a larger area,
* Average score - Population weighted average of the combined scores for the LSOAs in a larger area,
* Proportion of LSOAs in the most deprived 10% nationally,
* Extent - Proportion of a larger area’s population living in the most deprived LSOAs in the country,
* Local concentration - Population weighted average of the ranks of a larger area’s most deprived LSOAs that contain exactly 10% of the larger area’s population,
* Scale - Income Scale is the number of people who are income deprived and Employment Scale is the number of people who are employment deprived.

#### Q.3 - How easy or difficult do you find Indices statistics to use? On this scale, 1 represents very difficult and 5 represents very easy

4 – Four

#### Q.3.1 - Does the current suite of outputs and guidance material meet your needs? If not, what additions would you like to see?

We would like to see improvements to increase the user-friendliness and accessibility of the information for users with only limited time to review the data. For example, would it be possible to put together some simple, less technical descriptions of some of the summary measures of the indices? This would be helpful in facilitating meaningful conversations between academics, analysts and policy colleagues who are working at a strategic level. The definitions provided are technically clear but difficult to convey to lay audiences.

#### Q.4 - Is there anything you try to do with Indices of Deprivation data that could be made easier?

Our policy colleagues in Sheffield City Council have designed their own tools to show changes in rank of areas over time within our local authority. It would be helpful it a tool could be developed to easily show this at different geographies i.e. something similar to the 2015-2019 map tool that allows a visual comparison of a given postcode/area on a selected domain showing the national decile but does not lend itself easily to showing where there is relative improvement or relative decline across each domain.

### Future

Q.1 If you would like to be involved in any future exploration of any deprivation domains or methods, as part of a steering group or more detailed discussion for example, please re-enter your email address below and tick to confirm which area(s)

Email: sipher@glasgow.ac.uk

* Income Deprivation Domain,
* Employment Deprivation Domain,
* Health Deprivation and Disability Domain,
* Barriers to Housing and Services Domain

## Who to contact about this response.

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