

There is an emerging literature on well-being, and the structure and organization of the urban and rural environment. These concerns are spread out across a variety of different literatures including public health, sociology, and urban planning. This brief is a short review of some of the key papers in this important and emerging field.

These multi-level problems of individual well-being and the built environment are a source of continuing interest in the scientific literature. See for instance discussion of community-level determinants of:

- child abuse (Coulton et al. 1995)
- community diversity and tolerance (Oliver and Wong, 2003)
- creativity, industrial districts, and employment (Almeida and Phene 2004)
- environmental quality and chronic health conditions (Monks et al., 2009)
- mental health (Ross, 2000)
- obesity and physical exercise (Gordon-Larsen et al. 2006; Leslie et al. 2007)
- trauma care (Branas et al. 2005; Nathens 2000)
- vandalism and property-crime (Sampson and Raudenbush, 2004)

This is only a partial list; at least another 21 relevant articles have caught my attention here. The papers all have in common an interest in community or district-level outcomes, as opposed to an over-reliance on individual differences as an explanation.

Although these articles come from diverse disciplinary communities, they are of common interest to regional and European decision-makers, and perhaps share a common multi-disciplinary concern with communities and well-being. They also invite a particular set of problems and analyses.

More concretely, we will be asking questions of the form:

- How do the features [W] result in outcomes of well-being [X] for citizens [Y] in districts [Z]?
- Can we change feature [W] to improved measured outcomes?
- Can we anticipate community problem [X] given citizen mix [Y]?
- Are there disparities in outcome [X] across location [Z], and should we be concerned?
- Are there disparities in outcomes [X] across locations [Z], and does the incidence fall disproportionately on a particular segment of citizen?
- Can we learn given the experiences of similar regions [W, X, Y] and districts [Z]?

These questions are more fully operationalized in table 2, where specific classes of variables are listed. Part of the project will have to involve working with individual regions to source data, and ask questions of interest. At a minimum we can certainly source data from OpenStreetMaps and GoogleMaps (with image processing). We can also initialize data collection with social media (for instance tweets issued with a specific place) An additional part of the project will have to address how to crowd-source some of the important variables listed under X.

Table 2. Operational Expression of Variables

How do the following features [W]	Result in outcomes of well-being [X]	For citizen type [Y]	Within the geographic location [Z]
Feature of the built environment	Physical and mental health	Demographic data	Grid
Access to good or service	Self-expressions of welfare	Immigration data	District
Measure of environmental quality	Crime or vandalism	Segmentation data	
Access to transportation	Radicalization or hate-crime		
Employment and job creation	Domestic abuse or child abuse		

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