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From the MDGs to the Post-2015 Agenda: Analysing Changing Development Priorities

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From the MDGs to the Post-2015 Agenda: Analysing Changing Development Priorities

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2014

Abstract

The post-2015 agenda will be the single most important force shaping the future of international development. This paper analyses the content of that agenda. It provides both a cross-sectional view and a dynamic analysis of trends. This shows not only the likely post-2015 priorities but also trajectory: an insight into those issues and ideas which are falling down, continuing on, and rising up the international development agenda. The aim of the paper is to give researchers, strategists, policy-makers, advisors and others an overview of shape and direction at the core of international development. This will help them to plan and prioritise more effectively.

A. Introduction

The Millennium Development Goals have been a significant force within international development. But they have a "sell-by" date of 2015: the deadline by which they were supposed to be achieved. Work is currently underway on their replacement which will create a post-2015 development agenda (PTDA). The PTDA is a process rather than a finished product at the time of writing. However, a set of foundational documents have already emerged from that process; sufficient for us to understand the general direction and likely emphases of the post-2015 agenda, even if its exact content will not be certain until – in all likelihood – January 2016.

This paper has two purposes. First, to extract from those existing foundational documents the likely priorities within the post-2015 development agenda. Second, to compare this with the MDG agenda, thus understanding trajectory: which issues and ideas are moving up the development agenda; and which are moving down? The overall aim is to give researchers, strategists, policy-makers, advisors and others a snapshot of change within international development; helping them to plan and prioritise in advance of the actual agenda's emergence.

To achieve this aim, the paper has five further sections. Section B summarises the process by which the post-2015 agenda is being created. Section C steps back to ask how important the PTDA will likely be for international development generally, and for development research specifically. Section D undertakes a brief cross-sectional analysis of the content of the post-2015 agenda. Section E provides a more detailed longitudinal analysis of trends, identifying those issues which are diminishing, continuing, and rising on the development agenda. Finally, Section F summarises the broader context and shape of post-2015 dynamics. However, this is an inductive exercise with a main intention of allowing readers to identify implications of the post-2015 analysis for their own particular interests.

B. The Post-2015 Process

In theory, the origins of the post-2015 process could be traced to the setting of the Millennium Development Goal deadline since it was then obvious that there would be a post-MDG world from 2015. However, it seems more appropriate to date the timeline (see Figure 1, and more detailed timeline in Appendix A) from September 2011, with the formation of the UN System Task Team: the body charged with overseeing the post-2015 process.



Figure 1: Post-2015 Process Outline Timeline

The MDGs were an integration in 2001 of two rather separate processes: the OECD Development Assistance Committee's work on International Development Goals, and the UN's work to develop the Millennium Declaration (Hulme 2009). This added to the time and effort required to produce them, yet the same is happening again with the post-2015 process, as summarised in Figure 2 (adapted from Hickson 2013).



Figure 2: Post-2015 Development Agenda and Sustainable Development Goals Process Map

The timeline shown in Figure 1/Appendix A is therefore a single representation of multiple strands. The post-2015 development agenda process (top half of Figure 2) is relatively well-advanced. Following the UN System Task Team's formation, a series of thematic and national consultations on the agenda have already been conducted, with two key reports produced in 2012 and 2013. A High-Level Panel was set up by UN Secretary-General Ban Kimoon. Chaired by the Presidents of Indonesia and Liberia and the UK Prime Minister and involving 24 other "eminent persons", this produced its report mid-way through 2013. These documents were placed before the UN General Assembly when its 68th session began in September 2013, a session which included special meetings and events on the MDGs and after.

At the time of writing, the sustainable development goals (SDGs) process (bottom half of Figure 2) is not quite so well developed. Emerging from the 2012 UN Conference on

Sustainable Development ("Rio+20") and its General Assembly resolution in July 2012, this led to formation of a UN Open Working Group. The Group has been supported by a UN System Technical Support Team, which provides a link to the PTDA since it works under the UN System Task Team. It has also been supported by an "Intergovernmental Committee of Experts on Sustainable Development Financing" and a "High-Level Political Forum" that provides political momentum for the process. The Open Working Group has a series of eight sessions being run during 2013-2014, and structured along thematic lines. This will report towards the end of 2014.

At that point an integration of the two processes and political negotiation of the final post-2015 agenda should occur during 2015, leading to a new post-MDG framework to run from the start of 2016. It is worth just asking whether such a framework might not emerge. Present signs are that this would be extremely unlikely: process, timeline and structures are all in place; and significant political capital – plus other resources – has already been invested. It would take something huge and unexpected to derail the process. We can therefore work on the assumption that there will be a post-2015 agenda.

C. How Important Will The Post-2015 Development Agenda Be?

Before we move to analyse post-2015 agenda content and trends, it is appropriate to ask a couple of intervening questions which check implicit assumptions about the foundations for this activity.

Question number 1 is: "*How important will the PTDA be to international development?*". If it is just going to end up gathering dust on a shelf, or if it is just a side-show, then there is little point using it to shape one's priorities. We will not know the answer to that question until something like 2020 at the earliest but we have two current guides. The first is how important the post-2015 agenda is currently perceived to be. One set of evidence is the extent of participation in the consultation process. There have been nearly 100 national, six regional and eleven thematic consultations, with each of these typically involving many hundreds of organisational participants (e.g. TWWW 2013a, TWWW 2013b) plus thousands of online contributions (e.g. <u>http://trends.worldwewant2015.org/discover/#mode=type</u>). It is hard to benchmark this against other activities but it must represent one of the most substantial exercises in global consultation, in which many thousands of development organisations have engaged. Other evidence comes from polling perceptions: for example, of more than 100 civil society organisations in 27 developing countries surveyed in 2011, 87% wanted a post-2015 development framework (Pollard et al 2011).

A second guide is historical: investigating how important the MDGs have been to international development, given they are by far the closest historical phenomenon to the PTDA. There is a generalised assumption about the MDGs' importance: "the MDGs ... have an incontestable strength" (Prammer & Martinuzzi 2013: 4); "the Millennium Development Goals ... have unified, galvanized, and expanded efforts to help the world's poorest people." (McArthur 2013). However, in the complex field of influences that exists within

international development, attribution is problematic: "the direct development impact of the MDGs is difficult to determine" (Higgins 2013: iv).

Those who have sought to study this come up with differentiated conclusions depending on the area of influence investigated. For example:

- Debate/Discourse: "There is widespread agreement that the MDGs have placed broadbased poverty reduction at the center of the development agenda at least in international discussions and policy discourse" (Kenny & Sumner 2011: 1); "There is plenty of evidence of the influence of the MDGs on policy discourse, if this is measured by mention of the goals or their presence in donor policy documents, PRSPs and developing country government goals." (Lockwood 2012).
- Aid Flows: "The MDGs have mobilized government and business leaders to donate tens of billions of dollars" (McArthur 2013); "We argue that the MDGs may have played a role in increasing aid" (Kenny & Sumner 2011: 3).
- Policy: "For better or worse, the Millennium Development Goals (MDGs) have constituted the longest standing paradigm that has ever emerged in development thinking. The goals have been an organising framework for international aid over the last ten years. At the core of countless policy documents, plans and announcements" (Pollard et al. 2011: 1); "policy statements of major bilateral donors align with the MDG priorities only partially and in varying ways ... there is a considerable adoption of MDG priority areas, however there is equal or higher adoption of priorities *not* in the MDGs" (Kenny & Sumner 2011: 5-6).
- Outcomes: "the most powerful impact of the MDGs appears to have been on aid flows, but the impact of that aid on outcomes is difficult to assess and plausibly muted" (*ibid*.: 24); "In some areas, such as vaccination or primary education enrolment in sub-Saharan Africa, the links between the MDGs, the mobilisation and focusing of additional aid, and subsequent impacts seem convincingly close. But in others, the links seem less plausible" (Lockwood 2012).
- Practice: "The research shows that in the organisations studied [*small number of faith-based NGOs*], the extent of influence of the MDGs has been minimal upon development activities in a direct sense, although some indirect influence due to donor funding requirements has been reported." (Dore 2011).

Drawing on these sources and others (e.g. Gore 2009, Manning 2010), a subjective summary assessment of MDG impact can be drawn up as shown in Figure 3.



Figure 3: Relative Impact of MDGs on Differing Aspects of International Development

There should also be a final note on the reflexivity between development context and development agenda documents. The MDGs have partly shaped the development context but they also partly reflect that context. So we can expect the post-2015 agenda to partly lead but also partly follow the international development context, picking up many of the threads of ideas that are important at the time of creation: an issue I will return to below.

Question number 2 is for research-oriented readers: "*How important will the PTDA be to development research agendas and funding?*". Again, we can look at current evidence about PTDA activity, plus also historical evidence relating to the MDGs. At the time of writing, many of the major development research institutes – those with a majority focus on international development and lying at the top of the Think Tanks and Civil Societies Program rankings in McGann (2013) – have post-2015 initiatives underway. This seems much less true of US-based institutes, probably reflecting the lower levels of US engagement with the MDGs and the PTDA (e.g. Hulme 2009):

- Center for Global Development: has a number of blog posts on post-2015 and some <u>publications on the MDGs</u> which include thoughts on post-2015, but no main topics or initiatives.
- Kennedy School Center for International Development: has no apparent research programmes or specific activities related to the post-2015 agenda.
- International Food Policy Research Institute: has its own 2020 agenda but no major post-2015 research activity.

The picture is very different for development research institutes outside the US. Listing these in descending TTCSP rank order:

 Overseas Development Institute (UK): runs <u>www.post2015.org</u> and has a major programme on "<u>The MDGs to 2015 and Beyond</u>".

- United Nations University World Institute for Development Economics Research (Finland): does not have a specific initiative but is positioning its <u>future research</u> in relation to the post-2015 agenda.
- German Development Institute (Germany): has the "<u>What Will Be After 2015?</u>" research project on the post-2015 agenda.
- North-South Institute (Canada): has a "Post-2015" initiative of research, briefings, events, etc.
- Institute for Development Studies (UK): has a topic focus on "<u>Millennium Development</u> <u>Goals (MDGs) and Post 2015 Agenda</u>".

Alongside this snapshot of current activity, we can look at historical impact of the MDGs on research agendas and funding. Data on the output side is not particularly clear. A review was undertaken of articles in the three top development studies journals – *World Development, Development and Change*, and *Journal of Development Studies* – published during 2008-2013. This suggested that 1-2% of articles had a specific engagement with the MDGs (mentioned in the title or abstract), and 10-15% mentioned the MDGs somewhere in the main text. In the absence of other benchmarks, not much can be concluded from this data.

A stronger sense of the importance of the MDGs comes from the input side; from analysis of funder research strategies. For this activity, analysis was undertaken of the research strategies of three key development research funders – Canada's International Development Research Centre (IDRC), the Swedish International Development Cooperation Agency (SIDA), and the UK Department for International Development (DFID) – during the period 2002-2012. This suggested a continuum of MDG influence as summarised in Figure 4:

- IDRC: research strategy documents have just one or two passing references to the MDGs, and the MDGs do not frame research strategy. For example: "Although not explicit nor an underpinning of IDRC's health programming, there is an implicit interest in the health-related Millennium Development Goals" (IDRC 2009: 3-18).
- SIDA: the MDGs are one among a number of components that have shaped research strategy. For example, Regeringskansliet (2010) lists three foci for research: matters of relevance to low-income countries; research issues arising from international commitments as defined by the MDGs and UN conventions; and cooperative arrangements that identify new research of relevance to developing countries.
- DFID: "The current effort is ... using the Millennium Development Goals as the main framework for determining research strategies and priorities" (Surr et al. 2002: 43). "All DFID's efforts are directed towards achieving the targets set by the world community in the Millennium Development Goals by 2015. They are the basis for choosing research topics" (DFID 2004: 9). "The purpose of DFID's research is to make faster progress in fighting poverty and achieving the MDGs." (DFID 2008:17).





Taking together all of the evidence, it seems reasonable to conclude that – whatever its absolute strength and with acknowledgement to local variations – the post-2015 development agenda will be the single most important force shaping the future of development and of development research. It is certainly of sufficient importance for development organisations to take very seriously in the planning and prioritisation of future activities. If those future activities are in synch with post-2015, at the least they will have a credibility and perceived relevance they might not otherwise; at the most, they may gain greater funding, critical mass and impact.

D. The Post-2015 Agenda

The post-2015 development agenda is of sufficient importance that it justifies shaping – in part – our future development priorities. But what will that agenda be, given this is being written in 2014? The best guide at present appears to be four key documents that emerge from the totality of the post-2015 process as summarised in Figure 2^1 :

- The foundational "Realizing the Future We Want for All" document (UN 2012) and its update "A Renewed Global Partnership for Development" (UN 2013a): these are the products in 2012 and 2013 respectively of the UN System Task Team; the core of the post-2015 process.
- The High-Level Panel produced a report, "A New Global Partnership" in mid-2013 (HLP 2013) that has been strongly associated with post-2015 discussions.
- The Open Working Group, and High-Level Political Forum, and Expert Committee associated with Rio+20 and the Sustainable Development Goals are all in mid-process, so the best guide as yet is the outcome of the Rio+20 conference which is a UN General Assembly resolution of 2012 entitled, "The Future We Want" (UNGA 2012).

Textual analysis of these documents was undertaken. A simple approach to textual analysis is creation of tag clouds: the cloud for the post-2015 documentation is shown in Figure 5.



Figure 5: Tag Cloud for Combined Core Post-2015 Documentation

¹ A fifth candidate document was the Sustainable Development Solutions Network 2013 report, "An Action Agenda for Sustainable Development" (SDSN 2013) but at the time of writing, its role within the post-2015 process was unclear. Of course the analysis reported here can be updated in light of later documents as they appear in the post-2015 process.

A more detailed analysis was then undertaken via word counts within the documentation. In all, roughly 200 terms were analysed. The term list was developed via:

- a) selection from the top 500 words counted in the document using Wordle, which also produced the tag cloud; eliminating all non-discriminatory terms (very simple words like 'and', 'the', 'of'; basic words like 'also', 'must', 'well'; and those which relate to development but do not provide any particular guide to a development agenda such as 'development', 'developing', 'countries', etc), plus
- b) similar selection from the top 500 words within the MDG documentation (see below), plus
- c) cross-checking with terms used in a set of other current development reports and journal paper titles including those published in the top three development studies journals during 2013.

In order to allow for comparability (see next section), the frequency of all terms was normed to a mean count per 10,000 words.

	Frequency		Frequency		Frequency
	per		per		per
Term	10,000 Words	Term	10,000 Words	Term	10,000 Words
Sustainab*	94.6	Women	19.9	Water	14.8
System*	38.2	Implementation	19.5	(In)equalit*	14.0
Partnership	36.1	Food	18.7	Security	14.0
Environment*	33.9	Education	18.6	Communit*	13.5
Social	31.5	Rights	18.2	Trade	13.3
Economic	31.2	Growth	17.6	Particip*	13.1
Finan*	29.3	Energy	17.5	Business	12.5
Poverty	28.8	State(s)	17.5	Local	12.3
Policy/Policies	23.7	Public	17.1	Income	11.7
Health	21.3	Inclusi*	17.0	Transform*	11.7
Technol*	21.2	Accountab*	16.7	Job	11.5
Government	21.1	Process*	16.1	Information	11.0
		Cooperation	15.7	Private	10.8
		Child	15.5	Agric*	10.6
		Institution	15.5	Impact	10.6

All meaningful terms which appeared more than 10 times per 10,000 words (i.e. with a frequency of more than 0.1% of the text) are shown in Table 1.

Table 1: Most Frequent Development Terms in Post-2015 Documents

Detailed discussion of the post-2015 development agenda will be left to the next section, and readers may make their own analysis of the data presented in Table 1. I note the following ten conclusions:

1. The importance of sustainable development as a core model, alongside some recognition for a model of inclusive development.

- 2. Poverty and environment being the two most important individual development issues on the agenda.
- 3. Perhaps, a reasonable parity between three of the main domains of development: environmental, social, and economic. But a question mark over the place for political development: on the one hand, 'politic*' scores just 8.3 and so does not appear; but on the other, 'govern*' would score 31.2 and is sometimes the preferred terminology in addressing the fourth domain of development (e.g. SDSN 2013).
- 4. A strong presence for items related to MDGs 1 to 6: e.g. poverty, health, women, food, education.
- 5. A strong recognition of the importance of technology within development.
- 6. A strong presence for the mechanisms or processes of development: the need for partnerships and cooperation and participation, the role of policies, and explicit discussion of processes and implementation and impact.
- 7. Despite (see below) moves towards a more multi-stakeholder perspective on development and the presence of business and communities; still a dominant role for the state in its various guises: state, government, public sector.
- 8. Some sense of a systems perspective on development.
- 9. Maslow's shade or at least the importance of basic needs standing over the agenda given the presence of poverty, health, food, energy, water, security.
- 10. The recognised importance of data (just outside the list at 9.2) and information as the foundation for decision-making and action in development.

E. From the MDGs to Post-2105: The Changing Development Agenda

The analysis presented in the previous section is valuable in helping understand the post-2015 framework but it is static, and gives no sense of dynamics and trends within the development agenda. Those dynamics are important to all development stakeholders: "hot" topics garner funding and attention and political support, and so may gather momentum and produce real-world impact.

To deliver that sense of dynamics, a comparative analysis was undertaken with the MDG agenda. The four PTDA documents were compared with three core MDG documents (identified from Hulme 2009):

- The OECD Development Assistance Committee's "Shaping the 21st Century" report (DAC 1996) in 1996 which laid out the International Development Goals which were to significantly shape, and morph into, the MDGs.
- The United Nations 2000 document "We the Peoples" (UN 2000) which laid the basis within the UN for the Millennium Declaration and then the MDGs.
- The UN General Assembly report "Road Map towards the Implementation of the United Nations Millennium Declaration" (UNGA 2001); specifically Section III that specified and launched the MDGs.

The same textual analysis was undertaken as for the PTDA; for example producing a tag cloud for the MDGs as shown in Figure 6.



Figure 6: Tag Cloud for Combined Core MDG Documentation

One could undertake a visual comparison with the PTDA tag cloud shown in Figure 5, but a more systematic approach was comparison between the MDG and PTDA documents of the mean count per 10,000 words of the most-frequent terms. A raw comparison was undertaken but to help make more sense of the trends, those terms were aggregated into 25 key development issues. For details of the issues' constituent terms, see Appendix B.

The comparison between aggregated development issues can be represented in various ways. Figure 7 shows the percentage change in frequency per 10,000 words; Figure 8 shows the absolute change in frequency per 10,000 words. Since these measures represent different but important aspects of change, some overall measure was needed: an average of the two, as shown in Figure 9. That overall measure was created by using a comparable indicator – standard deviation – and calculating the average variation from zero of each development issue in terms of that indicator².

To allow greater insight into the data foundations, the same average measure of change was also calculated for all of the individual terms. The results are shown in Appendix C.

² Standard deviation is an imperfect indicator for the datasets but since it is not the absolute figure that was important in the calculation, but just some standardised and comparable measure of data dispersion, it serves as an adequate indicator.



Figure 7: Percentage Change in Issue Frequency from MDG to Post-2015 Core Documentation



Figure 8: Absolute Change in Issue Frequency from MDG to Post-2015 Core Documentation



Figure 9: Averaged Issue Change in Frequency from MDG to Post-2015 Core Documentation

In making comparisons between the MDGs and the post-2015 agenda, one might anticipate three outcomes as indicated in Figure 10:

- Subtraction: items within the MDG agenda that are no longer present in the post-2015 agenda.
- Continuity: items within the MDG agenda that remain in the post-2015 agenda.
- Addition: new items within the post-2015 agenda which were not present within the MDG agenda.



Figure 10: Comparing the Post-2015 and MDG Agendas

However, in practice, it was very difficult to find elements that had completely disappeared or elements that were completely new (though there were a few: see items marked '1000%' in Appendix B), so it makes more sense to think of a continuum of change from diminution through to expansion, which was broken down into four categories as summarised in Table 2 using the data from Figure 9.

MDG to PTDA	Development Goals	Development	Development
Change		Mechanisms	Perspectives
Diminution	 MDG 8 with ICTs/Digital 	 Traditional 	
	 Manufacturing 	Development Finance	
	– Insecurity	 Development Strategy 	
Continuity	 Wellbeing 	 Informatics 	
	 Infrastructure 		
	 Urban Development 		
	 Institutional Development 		
	– MDGs 1-6		
Some Expansion	 Rural/Agricultural Development 	 New Development 	 Complex
	– Services	Finance	Adaptive
	– Livelihoods	– Technovation inc. Data	Systems
	 Growth and Jobs 	and Mobile	
	 Rights and Justice 		
Significant	– Open Development	 Development Projects 	
Expansion	 Inclusive Development 	 New Stakeholders 	
	– Migration		
	 Environment and Sustainability 		

Table 2: Summarising Changes in Development Issues from MDGs to Post-2015 Agenda

In what follows, each of these issues will be discussed in order to provide a bit more background: this derives from both a personal as well as contextual perspective, and is not intended to be definitive.

E1. Development Issues Diminishing

As noted in Table 2, five issues were found to have slipped down the agenda somewhat, illustrating the reflexivity noted above, with both the MDGs and the PTDA reflecting the times and the context within which they were written.

MDG 8

The main components of MDG 8 – most likely reflecting their specificity in terms of scope and/or reflection of the times of their creation – remain within the post-2015 agenda but most have a diminished profile (see Figure 11).



Figure 11: MDG 8 Components – Percentage Change in Average Word Count from MDG to Post-2015 Core Documentation

ICTs

The diminution of ICTs particularly reflects the influence of the context in which agendas are created. The Millennium Development Goals were written at somewhere near the peak of the dot.com bubble, flowing out of the first mass diffusion of the Internet into Western organisations and society in the latter half of the 1990s. This was also a peak of concern about the "digital divide". As a result there was a wave of hope and hype around digital/information and communication technologies (ICTs) that found its place in the MDG documents, including the specific target, 8F, "In co-operation with the private sector, make available the benefits of new technologies, especially information and communications" with indicators on telecommunications, personal computer and Internet use.

Given that peak of interest, it is to be expected that these terms find less of a place in the post-2015 agenda. However, as discussed further below, this is not true of the overall domain of informatics, nor of some specific aspects which are expanding.

Aid

Traditional development finance – in the form of aid/official development assistance (ODA) – has slipped down the agenda somewhat in relative terms. This might seem surprising. As noted earlier in this paper, the MDGs have helped significantly boost levels of development assistance (see Figure 12; DI 2013a); something the economic crisis in the global North from 2008 has only slightly dented.



Figure 12: Flows of Official Development Assistance Over Time

However, in overall terms, aid is becoming steadily less important: it has slipped from around 8.5% of total financial resource flows into developing countries in 2000 to just over 6.0% in 2010, being far outstripped in both size and growth rates during this period by both remittances and foreign direct investment (DI 2013a, DI 2013b). The granular picture is much more varied – for three-quarters of very poorest countries (those with government spending of less than US\$200 per person per year) ODA still represents the single largest financial inflow (*ibid.*) – but the post-2015 agenda recognises the reality of a multi-channel financial world.

Manufacturing

The weighted share of manufacturing in global GDP fell from 29.2% in 2001 to 27.7% in 2011 while the share for services rose from 52.6% to 58.9% (CIA 2003, CIA 2012), reflecting longrun historical-trend changes in sectoral composition of economies. One might anticipate, therefore, the steady turn in emphasis within international development from manufacturing to services that seems to be apparent in moving from MDG to post-2015 agendas. There are, though, some causes for concern. In a number of developing countries e.g. in Asia, manufacturing has not necessarily reduced in its sectoral contribution. Assumptions of a declining role for manufacturing in development have been challenged, and evidence "points to the continued importance of manufacturing as an important engine of growth and catch up" (Szirmai 2009). Yet it is mentioned just three times in the entire corpus of post-2015 documents.

Insecurity

There are two trends at play here, which are reflected in the breakdown shown in Appendix B. Since the Second World War, there has been an ongoing (albeit uneven) trend for a decline in the number of wars and war deaths including a clear decline from the 1990s to the 2000s (Pinker 2011). There is now "more violence within nations than between them", with some signs that insecurity slightly increased during the 2000s (Chalabi 2013, Hewitt et al. 2012). Thus discussion of wars, conflict and humanitarian issues declines quite significantly within the post-2015 texts but discussion about violence and security greatly increases; the latter not quite offsetting the former.

Development Strategy

Overall, discussion of strategic tools in development – strategy, laws, policies – declines slightly in frequency; an increase in interest in laws not quite matching the reduction in discussion of strategy. This may represent a relative shift from the strategic to the operational, with relatively less concern about high-level guidance and relatively more concern about development mechanisms (see below). But the word "relatively" is noted: policy still appears in the first column of Table 1, and strategy lies only just outside the Table (9.4 occurrences per 10,000 words).

E2. Development Issues Continuing

A number of development issues show little change in emphasis from the MDG to the post-2015 agenda, as discussed below.

Development Issues of the 2000s

A set of issues that have had a strong presence on the academic development studies agenda during the 2000s show little variation comparing the MDGs to the post-2015 agenda. This may well be because their importance within development was already recognised by the late 1990s, and this has helped shape development studies during the 2000s. They include:

- *Wellbeing*, which itself increases in presence, though with other aspects of the link between psychology and international development not doing so.

- *Infrastructure*, which remains a foundational aspect of development.

- Institutional development, with discussion of institutions themselves and governance gaining somewhat greater recognition but with discussion of politics slipping back.
 - Urban development, which might have been expected to grow significantly given the demographic shift in developing countries from rural to urban, rises reasonably but is pegged back by the stasis in discussion of cities³.

Informatics

As illustrated in Figure 11, the particular terms 'ICTs' and 'digital' have – in common with some other aspects of MDG 8 – slipped down the agenda when we compare the MDGs and post-2015 framework. However, this is not true of related terms (see below), nor of informatics overall which has a stable presence post-2015. That overall picture can be seen to reflect an averaging of two trends.

First, an inevitable descent from the heights of the early 2000s. As noted above, the MDGs were written around a peak of global interest in ICTs. That wave rolled on into the 2000s, reaching a crescendo at the 2005 Tunis World Summit on the Information Society, attended by more 19,000 participants. There then followed a loss of momentum with a rhetoric of "mainstreaming" ICTs covering a reality of sidelining ICTs (Heeks 2011). Like adulterers in the wake of a fling, many in development seemed embarrassed by their earlier gushing enthusiasm for ICTs and – sometimes quite explicitly – wanted to blot their erstwhile paramour from their memories during the latter part of the noughties. But during the 2010s there has been some recovery, with new donor programmes emerging, though not reaching the earlier level.

That recovery arises particularly from the second trend, which is the phenomenal growth in ICTs worldwide. Summarised in Figure 13 (ITU 2013), this shows the world has moved from a promise to a reality of digital infrastructure in development: from 12 mobile phone subscriptions per 100 inhabitants in the world in 2000 to 96 in 2013; from 8 Internet users per 100 inhabitants in 2001 to 40 in 2013; and from 0.6 broadband subscriptions per 100 inhabitants in 2013.

³ And 'slum' falls by 73%.



Source: ITU World Telecommunication /ICT Indicators database

Figure 13: Global ICT Developments 2001-2013

Thus, digital technologies have become ever-more important in the lives of ordinary citizens in developing countries, with a clear trajectory that they will become just as integral to economic, social and political life as they have done in the global North.

Combining this growth trend in diffusion and application with the strong descent then small recovery within international development, we see an explanation for the overall pattern of continuation (actually small growth) in informatics within the post-2015 agenda. Particular elements have grown more strongly; something discussed later.

MDGs 1-6

The Millennium Development Goals 1-6 (see Figure 14; EC 2013) should probably best be understood as a core thread of continuity from MDG to PTDA documentation. The central issues of poverty, education, health, gender and women's empowerment are all still present. As an overall bundle, they show some increase in profile, though this average covers a degree of specific variation.



Figure 14: Summary of the Millennium Development Goals

There appears to be an increase in presence of the main development goals – especially relating to hunger and women but also to health, education, and to some degree poverty. But a number of the more specific issues represented by particular Millennium Development Goals – HIV/AIDS, malaria, maternal health, child development, girls' development – have much less emphasis.

E3. Development Issues Expanding Somewhat

The issues discussed below have moved up the development agenda to some extent.

Sectoral and Demographic Change

The growth trend in services was noted above in discussing manufacturing, and that is reflected in greater presence of services in the PTDA as compared with MDG discourse. This sits alongside a couple of apparently counter-trend changes from MDGs to post-2015 agenda.

The weighted share of agriculture in global GDP fell from 18.2% in 2001 to 13.6% in 2011 (CIA 2003, CIA 2012), yet the presence in documentation increased by about half. Likewise the proportion of global population living in rural areas shrank from more than 60% in the 1980s to less than half in 2010 and will drop below 40% by 2030 (WHO 2011). Yet prevalence of discussion about rural issues more than doubled in the post-2015 documentation compared to the MDGs⁴.

Although the somewhat increased profile of rural and agricultural development runs counter to demographic and economic trends, they likely represent the recognition of the

⁴ Discussion of 'geograph*' also increased significantly albeit from a tiny base of one mention; offering a peanut-worth of data to the idea of greater interest in geographic views of development.

importance of these issues in addressing the core development goals of poverty and sustainability, and their relative underplay within the MDGs (FF 2013). They also relate directly to the increased interest (noted just above) in hunger and in food (up 176%) and food security (up 73%).

Livelihoods and Justice

The foundational work on livelihoods was undertaken during the late 1990s (e.g. Scoones 1998, Ashley & Carney 1999, Ellis 2000). Yet the terminology of livelihoods hardly appeared in the MDG documents, showing a very strong increase in presence in the post-2015 agenda. To a lesser extent, the same is true of capabilities. That development concept emerged during the 1980s, particularly in Amartya Sen's work, and was already influential by the 1990s but gets little mention in relation to the MDGs, and shows only some growth into the post-2015 agenda.

One can see a similar pattern around notions of justice, which can also be connected back to work such as that of Sen in the 1980s. It was hardly mentioned in the MDGs but shows a huge rise in presence (though, oddly, there are still very few mentions of the phrase *du jour*, 'social justice'). Rights were very much part of the MDG discussion and the discourse of development at the time, but were not an explicit part of the MDGs themselves despite the strength of human rights as a foundation of the UN system. Perhaps reflecting the consequent criticism of the MDGs (e.g. Langford 2010), there is a greater discussion of rights in the post-2015 documentation.

Growth and Jobs

There is a long-standing and ongoing debate about the relationship between economic growth and international development (e.g. Seers 1969, Nafziger 2006). Within this debate a fairly clear trend can be detected: "economic growth dominated the development discourse throughout the 1970s, 1980s and early 1990s." (Rea 2011: 6). Growth then slipped down the agenda, a fade cemented within the MDGs which had no growth-related targets and only one of more than 60 indicators incorporating growth. However – impelled by the 2008 financial crisis – "economic growth is once again emerging as the dominant approach to development" (Roseveare 2011: 3), as reflected in its increased comparative presence within the post-2015 agenda.

By contrast enterprise and entrepreneurship are mentioned relatively little and show less of an increase⁵. There is some rise in discussion of employment/employability, etc, though that term was already an explicit MDG target. Mention of job(s) rises more than three-fold – an issue related to instability and uprising, such as the Arab Spring, that rightly or wrongly has been connected to youth unemployment – cementing the notion that both growth and employment have risen up the development agenda (UNDG 2013).

New Development Finance

The continuing importance of aid for some of the poorest nations and groups was noted above. But so, too, was the changing profile of development finance. That is reflected generally: prevalence rates of 'finan*' almost double from the MDG to the PTDA

⁵ 'Market' also rises only slightly: by 5%.

documentation⁶. And the change is also reflected in the post-2015 agenda with greater discussion of taxation, remittances and philanthropy. For example, global remittances rose from just under US\$200bn in 2000 to more than US\$500bn in 2013 (see Figure 15, Connor et al 2013) of which 6% went to low-income countries and 71% to middle-income countries (*ibid*.).





Technovation

"Technology has always been seen to play a central role in socio-economic development, and change in technology has thus been seen as an essential ingredient of development strategies throughout the world" (Heeks & Stanforth 2013: 2). However, there have been two chronological trends: "science and technology rather dropped from the development agenda in the 1980s and 1990s, only to re-emerge in the 2000s" (*ibid*.: 3). With the MDGs reflecting the agenda of the 1990s, and the PTDA that of the 2000s, it is no surprise to see a major increase in discussion of science and technology within the post-2015 framework.

The second trend is the changing focus of interest: "In the 1960s, the main process of interest was *adoption* ... In the 1970s and 1980s, attention shifted more to *transfer* ... In the 1980s and 1990s, the process of *adaptation* was incorporated ... In the 1990s and 2000s, there was growing interest in *innovation*" (*ibid*.: 3-4). That growing interest is exemplified by the more than three-fold increase in discussion of innovation within the post-2015 documents.

⁶ 'Money' rises nearly three-fold though still has less than one-tenth the mentions of 'finan*'.

Data and Mobile

Part of the growth in interest in technology and innovation relates to ICTs. As noted above, the period between the MDGs and the post-2015 agenda was marked by a surge in numbers of mobile phone subscriptions. That surge is also seen in a 150% increase in discussion of mobiles, though the actual presence is still small.

There is a much greater presence and a not-dissimilar increase in discussion about data. This is most obvious in the HLP report, which speaks of the need for a "data revolution" and a proposed Global Partnership on Development Data (HLP 2013). This is particularly linked to the idea of data supporting the open development agenda (see below), but there are three dominant aspects to a development data revolution:

- Big development data: the emergence of very large datasets relating to phenomena within developing countries. One main source has been mobile phone call records which have been used, for example, to examine intra- and inter-country migration (Molony 2012); but there are many other emerging and potential applications (ESS 2013).
- Open development data: the greater availability of developing country datasets for general use. By far the biggest growth area has been open government data which is particularly linked to improvements in accountability and in service delivery, as discussed further below (Davies et al 2013).
- Real-time development data: the availability of developing country data in real time; that is, simultaneous to the moment of the data-creating event. To date, lagged models have been dominant within developing country data and decision-making, with data becoming available months or years after the events that it describes. The growing diffusion of ICTs within developing countries is reducing this lag significantly to allow real-time or near-real-time use of data for development decisions (Global Pulse 2013).

Complex Adaptive Systems

The idea of understanding international development via the lens of complex adaptive systems has been around for some time (e.g. Lansing & Kremer 1993), especially in relation to natural resource-related development. From this base, arguments have been made that this concept could be applied more broadly (e.g. Mosse et al 1998, Ramalingam 2013). It is an exaggeration to say that this explicit conceptualisation has expanded within the post-2015 agenda: as can be seen from Appendix B one of the core aspects – complexity – is mentioned less than it was in MDG documentation. Another aspect – the uncertainty and volatility and shocks that arise with increasing complexity and interconnection – receives relatively few mentions, so it is hard to draw conclusions.

However, alongside greater discussion of adaptation, two other components of complex adaptive systems show a marked increase. The first is the notion of 'system': that we should conceive international development in systemic terms. Systems thinking can be so taken-for-granted that it disappears but it has a set of implications that take development in a particular direction: that development organisations and projects are made up of interrelated elements within a boundary; that we can model these systems and also the subsystems that exist within them; that these will have emergent features that cannot all be predicted in advance; and that – alongside processes and structures – these systems will have properties.

It is these properties that bring us to the third component rising up the development agenda: resilience. Resilience is that property of a system (which could be a household, community, organisation, nation, etc) which enables it "to withstand and recover from short-terms shocks, and to adapt to long-term trends" (Heeks & Ospina 2013). Given the projected growth in environmental, social and economic shocks during the coming decades and the associated rise in risk (UNDP 2011, WEF 2013), resilience will become increasingly important if development trajectories are to move forwards rather than slipping backwards. Because it is potentially so foundational to a 21st century view of development, not only will resilience be reflected in the post-2015 framework but it is already the basis for a number of development initiatives: Rockefeller and the UN system both have Resilient Cities initiatives; Oxfam and the World Food Programme run the R4 Rural Resilience Initiative; the EU is funding the RESILIENT project; DFID has set up an NGO group on resilience; and so on.

E4. Development Issues Expanding Significantly

The issues covered in this section have all risen up the development agenda to a significant extent.

Open Development

Most views of open development are very data-oriented: "Open development is about making information and data freely available and searchable, encouraging feedback, information-sharing, and accountability" (World Bank 2014). This data-oriented view links open development specifically to transparency, accountability and the fight against corruption. All of these – especially transparency and accountability – show a very significantly-increased profile within the post-2015 agenda, and their connection is summarised in Figure 16 (Heeks 2013 (IS = information system)), which shows how flows of data from a development process (e.g. the activities of a potentially-corrupt public official) can support stages of reporting, transparency and accountability⁷.

⁷ Transparency and accountability often seem to be treated synonymously but, as can be seen, they are different. Where transparency allows a recipient to monitor the performance of a development process and evaluate it against some pre-set benchmark, accountability goes further by permitting the recipient some mechanism of control (e.g. reward or punishment) over the source.



Figure 16: A Data-Oriented View of Transparency and Accountability

This view of open development – linked to data and accountability of development participants and processes – is by far the main one that emerges from the post-2015 documentation. However, there are other ideas around openness that do also appear – open innovation, open markets, open source. Together, then, there is a broader concept of open development which can be linked to more philosophical, psychological and systemic conceptions of openness. These create a notion of development based around acceptance of diversity, participation, collaboration and sharing (Reagle 2006, Peters 2012)⁸.

Development Projects

"Development projects remain central to international development. They represent key mechanisms by which development goals become development impacts, and we may define them in that way, as organised means seeking to achieve specific development outcomes" (Heeks & Stanforth forthcoming). Yet development projects and their management have historically had a low profile: "a review of published research in seven leading development studies journals⁹ from 2000 to 2012 reveals fewer than five papers investigating the specific practice of development project implementation and management" (*ibid.*).

There are signs of this changing, with significantly greater profile for project-related concepts within the post-2015 documentation. One impetus for this has been evidence of how much projects matter in the delivery of development outcomes; for example from the

⁸ Though perhaps not based around freedom: "free*" declines somewhat in frequency from the MDGs to the PTDA.

⁹ World Development; Journal of Development Studies; Development and Change; Development Policy Review; European Journal of Development Research; Studies in Comparative International Development; Third World Quarterly.

World Bank study showing the marked impact of implementation factors such as extent and quality of project management (Denizer et al 2011). This in turn has led to World Bank President Jim Kim's emphasis from 2013 on the "science of delivery" (Wagstaff 2013). These reflect more generally flows within development discourse which we see in the significant increases in presence for 'implementation', 'process', 'delivery' and 'monitoring' within the post-2015 documentation. As previously pointed out, in relative terms then, we can see a tipping of the development see-saw with less interest in development policy and strategy, and much more interest in development projects and practice.

Inclusive Development

There have been growing concerns that improvements in overall national-level development indicators are masking growing intra-country inequalities, and that higher inequality – as well as being inherently problematic – will retard development in the long run (e.g. Wilkinson & Pickett 2010, Stiglitz 2012). There is debate on the extent to which the creation of inequality is inherent to particular development models. However, there is a strong association of the neo-liberal model with formation of inequality (e.g. Lazzarato 2009), and hence sometimes an assumed requirement for alternative approaches to development in order to address this issue.

The key terminology for that alternative approach is "inclusive development"; meaning development that provides opportunities and benefits for all, including those who have to a relative or absolute extent been excluded by development to date (e.g. Rauniyar & Kanbur 2009). Its incursion into the development debate can be seen by the 1000% rise in discussion of inclusion/inclusivity and exclusion in the post-2015 agenda compared to the MDGs.

As often with a growing terminology, the label covers a number of different perspectives, among which can be identified (Heeks et al 2013):

- *Identity*: which group(s) are particularly seen as having been historically excluded and as needing to be included in future development? Group identities include the poor, women, youth, the disabled and ethnic minorities.
- **Scope**: will the excluded group be specifically targeted by developmental measures or will everyone in society be covered?
- **Nature**: how is inclusion understood? This is typically divided into views of those who think inequality can be addressed simply in terms of development outputs vs. those who think marginalised groups must be included in development processes. A more differentiated view is shown in the "ladder of inclusion" (Figure 17, adapted from Heeks et al 2013):
 - *Level 1/Intention*: development is inclusive if the intention of that development is to address the needs or wants or problems of the excluded group.
 - *Level 2/Consumption*: development is inclusive if its outputs are adopted and used by the excluded group.
 - *Level 3/Impact*: development is inclusive if it has a positive impact on the livelihoods of the excluded group.
 - *Level 4/Process*: development is inclusive if the excluded group participates in the planning, design and implementation of that development.

- *Level 5/Structure*: development is inclusive if it is created within a structure that is itself inclusive.
- *Level 6/Post-Structure*: development is inclusive if it is created within a frame of knowledge and discourse that is itself inclusive.



Figure 17: Understanding the Different Levels of Inclusive Development

New Stakeholders

As noted already, there was a strong emphasis on donors and aid within the MDGs, with a fairly typical development model of working through government or NGOs. That seems to have changed in the post-2015 agenda in two ways. First, a greater plurality of development actors is recognised: there is a small growth in discussion of communities, and a very large growth in discussion of business. (And – while they retain the strong presence shown in Table 1 – there are fewer mentions of government (down by 6%), states (down by 35%), and NGOs (down by 70%) to set alongside the reduction in occurrence of donors.)

Second, there is much greater recognition of associative approaches to development with very large rises in discussion of stakeholders, cooperation and partnership. (There are smaller rises also in mention of collaboration (up 46%) and participation (up 72%, though this could also be associated with the rise up the agenda of inclusive development).)

At least within discourse, then, there is a much greater acknowledgement in the post-2015 agenda of development as a multi-stakeholder partnership.

Migration

International migration grew more than twice as fast during the 2000s as during the 1990s (see Figure 18; UN 2013b), with migrants (of whom around 7% are refugees) comprising 3.2% of the world's population in 2013.



Figure 18: Global Migrants Over Time (millions)

This increase in movement – which has grown faster South-to-South than South-to-North – has brought many economic, social and political issues in its wake from the wellbeing of migrant populations (IOM 2013) to "brain drain" from developing countries (OECD 2013). It has risen up the political agenda in a number of countries in the wake of the global financial crisis (Palmer 2012), and thus forms a much greater part of the post-2015 debate than was the case for the MDGs.

Environment and Sustainability

Both environment and sustainability were incorporated into the MDGs: goal 7 seeks to ensure environmental sustainability and has a set of associated targets and indicators. However – and despite a very bumpy ride against headwinds of scepticism, denial and a global economic crisis that took away much of its political oxygen – environmental issues increased in importance subsequent to the MDGs. Political headway was made via the CoP meetings and in greater acceptance of climate change within the US administration; and scientific headway was made in providing clearer evidence of past, current and future human damage to the environment, alongside an at least apparent increase in severe weather events globally (SDSN 2013).

All of this has meant that environmental issues show by far the greatest rise up the development agenda in comparing the MDGs with post-2015 directions. Of course, the incorporation of the Rio+20 documentation is an important part of this since it discusses

environment and, especially, sustainability a good deal. But the specific rise in sustainability is head and shoulders above all other changes. It lies at the heart of all four documents, and so the changes are broad-ranging:

- Climate change was mentioned only once in the main MDG document but is mentioned many times in all the PTDA documentation. Related issues such as disasters are also discussed more often.
- There is much greater discussion of energy (with rises in related terms such as 'renewables' and 'oil'), not just related to environmental impact but also to worries about energy security, which appears for the first time.
- There is much greater presence of discussion related to waste.
- Discussion about sustainability is woven into many parts of all four PTDA documents and it moves beyond the direct and sole relation to environmental issues towards being a new paradigm for development overall.

F. The Post-2015 Agenda in Overview

The main purpose here has been to present data rather than to draw broader conclusions: this was an inductive process and, as such, the trees are easier to spot than the wood. But this was also the intention, allowing readers to attend to those 'trees' which fit their own interests. However, some summary can be extracted from the static and dynamic data on the post-2015 agenda; a summary that in many ways reflects the overview ideas presented within the post-2015 reports themselves.

The fact that the great majority of development issues rise rather than fall in frequency might be an artefact; for example if the documents were different in nature or writing style. This may be a small explanation but does not hold much water: generally these are all summary documents for public consumption that seek to set or reflect a development agenda with all but one written from within or around the UN system.

So one may conclude that the post-2015 documents represent a richer, more multi-faceted view of development. This may reflect the consultative process behind their creation, with everyone trying to get their issue somewhere on the agenda. The actual post-2015 framework may simplify. However, prototype frameworks to date (e.g. HLP 2013, SDSN 2013) are much richer than the MDGs. This partly reflects some of the criticisms of the MDGs; that they simplified too much and missed out a set of important issues which have now found their way into the post-2015 documents. And it also reflects the ongoing complexification of development.

Absolute and dynamic differences between the context of the late 1990s and the context of the mid-2010s also help explain the findings of Section E, as often noted in the text. In relative terms, the MDGs were written at a time of stable politics and growing economies. The post-2015 agenda is being created within a world suffering an ongoing series of economic, environmental and socio-political shocks.

So some of the agenda dynamics reflects real-world change – aid is no longer as important as it was; there has been some decline in war and conflict; services have grown relative to manufacturing; migration and mobile use are rising; the private sector has an ever-larger role in developing countries. Some of the agenda trajectory reflects a mix of real-world change and the moving political spotlight: growth, jobs, inclusion and inequality are rising because of new evidence and a new economic context, but also because political insecurities have made them more salient. Climate change and sustainability also fall into this category, though the political impetus to address them remains distributed and volatile.

And some trends seem to fall more squarely into the realm of fads and fashions. There are long-burn issues that have taken a while to arrive at the centre of development debate: livelihoods, capabilities, rights, justice and systems are all candidates here. Others are more cyclical – development projects and management, science and technology were central to development debate from the mid-20th century, then faded, and are only just returning. Indeed, for these and other issues, we might invoke the hype cycle (see Figure 19; Fern 2008). ICTs, for instance, are much more important to life in 2014 than 1999 but are only just recovering from their over-hyped peak. Resilience and other recent arrivals on the development agenda may follow a similar path.



Figure 19: The Hype Cycle

We can try to reach into the data to find the changing narratives of development. One – which we can associate with the fastest-rising terms including sustainability, resilience and uncertainty – is that development in 2000 was about moving forwards. Development in 2015 will be about that, but will also be about not slipping backwards. With disability,

inclusion/exclusion, partnership and stakeholders as other fastest-rising terms, we might also see a changing narrative from "development for many" to "development for all".

In turn, the events and changing priorities of the 2000s could be seen as a(nother) challenge to the neo-liberal model that has been the dominant development paradigm. Perhaps we have finally reached a point of inflection for that model in which the weight of its associated externalities give rise to some alternative. Of course claims of such a point are arguably continuous from Marx onwards, and the MDGs themselves – while not really challenging the neo-liberal model – spoke as much from the human development paradigm as any other.

There is certainly an expressed desire to move from an incremental to more transformative notion of development: that is a core leitmotif of the High-Level Panel report but it appears throughout the PTDA discussions. In practice, the aspiration for transformation sometimes means more of the same but if there is a paradigmatic transition, it is most likely to be to a sustainable development worldview. How much political traction this will have with Western governments still likely to see themselves as fragile and emerging from recession during 2014 and 2015 remains to be seen. There is additionally the sense that opposition to neo-liberalism is somewhat divided. The post-2015 documents echo other development worldviews that could be transformational if they were the centrepiece for the future of development but which currently sit as one ingredient of the mix: inclusive development, rights-based development, perhaps even open development if it were able to deliver a well-grounded and broad narrative.

Returning to a main theme, above all, the post-2015 agenda – like the MDGs – reflects the world in which it is being created. A world of growing climate change and growing inequality, of increasing global flows of capital and labour, of increasing complexity and connectivity in which a rising number of stakeholders want their voice to be heard and their views taken into account. So alongside paradigms like sustainable, inclusive and open development will need to be a worldview that accepts development as a complex adaptive system, and seeks ways to manage that emerging reality.

References

Ashley, C. & Carney, D. (1999) *Sustainable Livelihoods: Lessons from Early Experience*, Department for International Development, London

Chalabi, M. (2013) Global peace index 2013, *Datablog*, 11 Jun <u>http://www.theguardian.com/news/datablog/2013/jun/11/global-peace-index-2013</u>

CIA (2003) The World Factbook 2003, Central Intelligence Agency, Langley, VA

CIA (2012) The World Factbook 2012, Central Intelligence Agency, Langley, VA

Connor, P., Cohn, D. & Gonzalez-Barrera, A. (2013) *Changing Patterns of Global Migration and Remittances*, Pew Research Center, Washington, DC <u>http://www.pewsocialtrends.org/2013/12/17/changing-patterns-of-global-migration-and-remittances/</u>

DAC (1996) *Shaping the 21st Century: The Contribution of Development Co-operation*, OECD, Paris <u>http://www.oecd.org/dac/2508761.pdf</u>

Davies, T., Perini, F. & Alonso, J.M. (2013) *Researching the Emerging Impact of Open Data*, ODDC Working Paper 1, Open Data Research Network <u>http://www.opendataresearch.org/sites/default/files/posts/Researching%20the%20emerging%20impacts%20of%20open%20data.pdf</u>

Denizer, C., Kaufmann, D. & Kraay, A. (2011) *Good Countries or Good Projects?*, Policy Research Working Paper 5646, World Bank, Washington, DC

DFID (2004) *DFID Research Funding Framework 2005-2007*, DFID, London <u>http://globalgrn.files.wordpress.com/2009/08/dvidresearch-framework-2005.pdf</u>

DFID (2008) *Research Strategy 2008-2013*, DFID, London <u>https://www.gov.uk/government/uploads/system/uploads/attachment_data/file/67757/re</u> <u>search-strategy-08.pdf</u>

DI (2013a) *Official Development Assistance (ODA) Factsheet*, Development Initiatives, Bristol <u>http://devinit.org/factsheet/factsheet-oda/</u>

DI (2013b) *Mobilising All Resources to Meet the Post-2015 Goals*, Development Initiatives, Bristol <u>http://devinit.org/wp-content/uploads/2013/12/Mobilising-all-resources-to-meet-the-post-2015-goals1.pdf</u>

Dore, M. (2011) Keeping Faith with the MDGs, MSc Dissertation, University of Edinburgh

EC (2013) *The EU and the Millennium Development Goals*, European Commission, Brussels <u>http://ec.europa.eu/europeaid/what/millenium-development-goals/</u>
Ellis, F. (2000) *Rural Livelihoods and Diversity in Developing Countries*, Oxford University Press, Oxford, UK

ESS (2013) *Big Data for Social Good*, Engineering Social Systems, University of Harvard, Cambridge, MA <u>http://www.hsph.harvard.edu/ess/bigdata.html</u>

Fern, J. (2008) Understanding Gartner's Hype Cycles, Gartner, Stamford, CT

FF (2013) The Post-2015 Development Agenda and the Sustainable Development Goals, Farming First <u>http://www.farmingfirst.org/wordpress/wp-</u> <u>content/uploads/2013/05/Farming-First-Post-2015-position-4-pager.pdf</u>

Global Pulse (2013) United Nations Global Pulse, United Nations, New York, NY http://www.un.org/millenniumgoals/pdf/GP%20Backgrounder-General2013 Sept2013.pdf

Gore, C. (2009) *The Global Development Cycle, MDGs and the Future of Poverty Reduction*, European Association of Development Research and Training Institutes, Bonn <u>http://www.eadi.org/fileadmin/MDG_2015_Publications/Gore_PAPER.pdf</u>

Heeks, R.B. (2011) Mainstreaming ICTs in development: the case against, *ICT4DBlog*, 30 Oct <u>http://ict4dblog.wordpress.com/2010/10/30/mainstreaming-icts-in-development-the-case-against/</u>

Heeks, R.B. (2013) *eCitizens: Connecting Citizens and Government*, Centre for Development Informatics, University of Manchester, UK

Heeks, R.B. & Ospina, A.V. (2013) *Understanding Urban Climate Change and Digital Infrastructure Interventions from a Resilience Perspective*, Development Informatics Working Paper 54, Centre for Development Informatics, University of Manchester, UK <u>http://www.seed.manchester.ac.uk/subjects/idpm/research/publications/wp/di/</u>

Heeks, R.B. & Stanforth, C. (2013) *Technological Change in Developing Countries: Opening the Black Box of Process using Actor-Network Theory*, Actor-Network Theory for Development Working Paper 5, Centre for Development Informatics, University of Manchester, UK

http://www.cdi.manchester.ac.uk/resources/ant4d/documents/ANT4DWorkingPaper5Heek sStanforth.pdf

Heeks, R.B. & Stanforth, C. (forthcoming) Understanding development project implementation: an actor-network perspective, *Public Administration and Development*

Heeks, R.B., Amalia, M., Kintu, R. & Shah, S. (2013) *Inclusive Innovation: Definition, Conceptualisation and Future Research Priorities*, Development Informatics Working Paper
53, Centre for Development Informatics, University of Manchester, UK
<u>http://www.seed.manchester.ac.uk/subjects/idpm/research/publications/wp/di/</u> Hewitt, J.J., Wilkenfeld, J., Gurr, T.D. & Heldt, B. (eds) (2012) *Peace and Conflict 2012*, Center for International Development and Conflict Management, University of Maryland, College Park, MD <u>http://www.cidcm.umd.edu/pc/executive_summary/exec_sum_2012.pdf</u>

Hickson, C. (2013) Post-2015 development goals process and timeline, *Trio Policy*, 11 Jul <u>http://www.triopolicy.com/post-2015-development-goals-process-and-timeline/</u>

Higgins, K. (2013) *Reflecting on the MDGs and Making Sense of the Post-2015 Development Agenda*, The North-South Institute, Ottawa, ON

HLP (2013) A New Global Partnership: Eradicate Poverty And Transform Economies Through Sustainable Development, High-Level Panel of Eminent Persons, United Nations, New York http://www.post2015hlp.org/wp-content/uploads/2013/05/UN-Report.pdf

Hulme, D. (2009) *The Millennium Development Goals (MDGs): A Short History of the World's Biggest Promise*, BWPI Working Paper 100, Brooks World Poverty Institute, University of Manchester, UK <u>http://www.bwpi.manchester.ac.uk/resources/Working-Papers/bwpi-wp-10009.pdf</u>

IDRC (2009) Innovating for Development Strategic Framework 2010-2015, IDRC, Ottawa http://www.idrc.ca/EN/AboutUs/WhatWeDo/Documents/12614275681Strategic framewor k 2010-2015.pdf

IOM (2013) World Migration Report 2013, International Organization for Migration, Geneva

ITU (2013) *Statistics*, International Telecommunication Union, Geneva <u>http://www.itu.int/en/ITU-D/Statistics/Pages/stat/default.aspx</u>

Kenny, C. & Sumner, A. (2011) *More Money or More Development: What Have the MDGs Achieved?*, Working Paper 278, Center for Global Development, Washington, DC <u>http://international.cgdev.org/files/1425806_file_Kenny_Sumner_MDGs_FINAL.pdf</u>

Langford, M. (2010) A poverty of rights: six ways to fix the MDGs, IDS Bulletin, 41(1), 83-91

Lansing, J.S. & Kremer, J.N. (1993) Emergent properties of Balinese water temple networks: coadaptation on a rugged fitness landscape, *American Anthropologist*, 95(1), 97-114

Lazzarato, M. (2009) Neoliberalism in action, Theory, Culture & Society, 26(6), 109-133

Lockwood, M. (2012) What have the MDGs achieved? We don't really know, *From Poverty* to Power, 31 Aug <u>http://www.oxfamblogs.org/fp2p/?p=11498</u>

Manning, R. (2010) The impact and design of the MDGs: some reflections, *IDS Bulletin*, 41(1), 7-14 <u>http://www.humanitarianforum.org/data/files/impactanddesignofmdg.pdf</u>

McArthur, J. (2013) Own the goals: what the millennium development goals have accomplished, *Foreign Affairs*, March/April http://www.brookings.edu/research/articles/2013/02/21-millennium-dev-goals-mcarthur

McGann, J.G. (2013) 2012 Global Go To Think Tanks Report and Policy Advice, Think Tanks and Civil Societies Program, University of Pennsylvania, Philadelphia, PA <u>http://gotothinktank.com/dev1/wp-</u> content/uploads/2013/07/2012 Global Go To Think Tank Report - FINAL-1.28.13.pdf

Molony, T. (2012) ICT and mobility, Information Technology for Development, 18(2), 87-90

Mosse, D., Farrington, J. & Rew, A. (eds) (1998) *Development as Process: Concepts and Methods for Working with Complexity*, Routledge, London

Nafziger, E.W. (2006) *From Seers to Sen: The Meaning of Economic Development*, Research Paper 2006/20, UNU WIDER, Helsinki, Finland http://www.wider.unu.edu/publications/working-papers/research-papers/2006/en_GB/rp2006-20/

OECD (2013) *World Migration in Figures*, OECD, Paris <u>http://www.oecd.org/els/mig/World-Migration-in-Figures.pdf</u>

Palmer, A. (2012) All over Europe, immigration is moving in from the political fringes, *The Telegraph*, 23 Jun <u>http://www.telegraph.co.uk/news/politics/9350672/All-over-Europe-immigration-is-moving-in-from-the-political-fringes.html</u>

Peters, M.A. (2012) Open works, open cultures and open learning systems, in: *Putting Knowledge to Work and Letting Information Play*, 2nd edn, T.W. Luke & J.W Hunsinger (eds), Sense Publishers, Rotterdam, 55-71

Pinker, S. (2011) Violence vanquished, *The Wall Street Journal*, 24 Sept <u>http://online.wsj.com/news/articles/SB10001424053111904106704576583203589408180</u>

Pollard, A., Sumner, A., Polato-Lopes, M. & de Mauroy, A. (2011) *100 Voices*, CAFOD, London <u>http://www.cafod.org.uk/Media/Files/Resources/Policy/100-Voices</u>

Prammer, E. & Martinuzzi, A. (2013) *The Millennium Development Goals (MDGs) and the Post-2015 Debate*, Case Study no.13, European Sustainable Development Network, Vienna

Ramalingam, B. (2013) Aid on the Edge of Chaos, Oxford University Press, Oxford, UK

Rauniyar, G. & Kanbur, R. (2009) *Inclusive Growth and Inclusive Development*, Occasional Paper 8, Asian Development Bank, Bangkok <u>http://www.adb.org/sites/default/files/OP8-inclusive-growth-development.pdf</u>

Rea, J. (2011) Growth comes full circle, *The Networker*, May-July, 6-7 <u>http://www.bond.org.uk/data/files/The Networker May-July 2011 issue 97 high res.pdf</u> Reagle, J. (2006) Notions of openness, paper presented at *FM10 Openness: Code, Science and Content*, Chicago, 13-15 May <u>http://reagle.org/joseph/2006/02/fm10-openness</u>

Regeringskansliet (2010) *Research for Development*, Regeringskansliet, Stockholm <u>http://www.government.se/content/1/c6/14/60/03/eab96d0b.pdf</u>

Roseveare, N. (2011) Coming full circle, *The Networker*, May-July, p.3 <u>http://www.bond.org.uk/data/files/The Networker May-July 2011 issue 97 high res.pdf</u>

Scoones, I. (1998) *Sustainable Rural Livelihoods: A Framework for Analysis*, Institute of Development Studies, University of Sussex, Brighton, UK

SDSN (2013) An Action Agenda for Sustainable Development, Sustainable Development Solutions Networks, Paris <u>http://unsdsn.org/files/2013/11/An-Action-Agenda-for-</u> <u>Sustainable-Development.pdf</u>

Seers, D. (1969) *The Meaning of Development*, Institute of Development Studies, University of Sussex, Brighton, UK <u>http://www.ids.ac.uk/files/dmfile/themeaningofdevelopment.pdf</u>

Stiglitz, J.E. (2012) The Price of Inequality, WW Norton, New York, NY

Surr, M., Barnett, A., Duncan, A., Speight, M., Bradley, D., Rew, A. & Toye, J. (2002) *Research for Poverty Reduction: DFID Research Policy Paper*, DFID, London <u>http://www.idee.ceu.es/Portals/0/Actividades/Doc Reduccion Pobreza.pdf</u>

Szirmai, S. (2009) *Industrialisation as an Engine of Growth in Developing Countries*, Working paper 2009-10, UNU-MERIT, Maastricht <u>http://www.merit.unu.edu/publications/wppdf/2009/wp2009-010.pdf</u>

TWWW (2013a) Global Thematic Consultation on Governance and the Post-2015 Development Framework, The World We Want <u>http://www.worldwewant2015.org/governance/finalreport</u>

TWWW (2013b) *Health in the Post-2015 Agenda,* The World We Want <u>http://www.worldwewant2015.org/health</u>

UN (2000) 'We the Peoples': The Role of the United Nations in the 21st Century, United Nations, New York, NY <u>http://www.unmillenniumproject.org/documents/wethepeople.pdf</u>

UN (2012) *Realizing the Future We Want for All*, United Nations, New York, NY http://www.un.org/en/development/desa/policy/untaskteam_undf/untt_report.pdf

UN (2013a) *A Renewed Global Partnership for Development*, United Nations, New York, NY <u>http://www.un.org/en/development/desa/policy/untaskteam_undf/glob_dev_rep_2013.pd</u>

UN (2013b) Trends in International Migrant Stock, United Nations, New York, NY

UNDG (2013) *Growth and Employment in the Post-2015 Agenda*, UN Development Group <u>http://issuu.com/undp/docs/final_report_growth_employment_post</u>

UNDP (2011) *Towards Human Resilience*, United Nations Development Programme, New York, NY

http://www.undp.org/content/dam/undp/library/Poverty%20Reduction/Towards_Sustainin gMDG_Web1005.pdf

UNGA (2001) Road Map Towards the Implementation of the United Nations Millennium Declaration, UN General Assembly, New York, NY <u>http://www.un.org/documents/ga/docs/56/a56326.pdf</u>

UNGA (2012) *The Future We Want*, A/RES/66/288, United Nations General Assembly, New York, NY <u>http://www.un.org/ga/search/view_doc.asp?symbol=A/RES/66/288&Lang=E</u>

Wagstaff, A. (2013) So what exactly is the "science of delivery"?, World Bank blogs, 8 April <u>http://blogs.worldbank.org/developmenttalk/so-what-exactly-is-the-science-of-delivery</u>

WEF (2013) *Global Risks 2013*, World Economic Forum, Geneva, Switzerland <u>http://www.weforum.org/reports/global-risks-2013-eighth-edition</u>

WHO (2011) Urban Population Growth, World Health Organization, Geneva http://www.who.int/gho/urban health/situation trends/urban population growth/en/ind ex.html

Wilkinson, R. & Pickett, K. (2010) *The Spirit Level: Why Equality is Better for Everyone*, Penguin Books, London

World Bank (2014) *Open Development*, World Bank, Washington, DC <u>http://www.worldbank.org/open/</u>

Appendix A: Post-2015 Process Schedule

Sourced largely from Hickson (2013)

Date	Activity	
Sep 2010	UN MDG Summit and UN General Assembly request to Secretary	
	General to look into post-2015 agenda	
Sep 2011	UN System Task Team established to lead post-2015 process	
May 2012-Apr	Post-2015 thematic global consultations (Conflict and Fragility;	
2013	Education; Energy; Environmental Sustainability; Food Security;	
	Governance; Growth and Employment; Health; Inequalities; Population	
	Dynamics; Water)	
Jun 2012	Rio+20 summit; working group on Sustainable Development Goals	
	(SDGs) set up	
Jun 2012	UN System Task Team "Realizing the Future We Want for All" report	
Jun 2012	National post-2015 consultations begin	
Jul 2012	Rio+20 "The Future We Want" resolution to UN General Assembly	
Aug 2012	High-Level Panel (HLP) set up by Ban Ki-moon, who also launches UN	
	Sustainable Development Solutions Network (SDSN)	
Sep 2012	HLP convened	
Nov 2012-Mar	Three HLP meetings (London, Monrovia, Bali)	
2013		
Jan 2013	SDG Open Working Group created	
Feb 2013	EU post-2015 communication "A Decent Life for All"	
Mar 2013	UN System Task Team "A Renewed Global Partnership for	
	Development" report	
Mar 2013-Feb	Eight sessions of SDG Open Working Group	
2014		
May 2013	Draft SDG report	
May 2013	HLP "A New Global Partnership" report	
Jul 2013	Progress report of SDG Open Working Group to UN General Assembly	
Sep/Oct 2013	New UN General Assembly session and UNGA MDG Review Summit	
Sep 2013	First session of High-Level Political Forum on sustainable development	
Oct 2013	SDSN "An Action Agenda for Sustainable Development" report	
Sep 2014	SDG Open Working Group to report to UN General Assembly	
Jan 2015	MDG deadline	
Jan-Dec 2015	Intergovernmental negotiations within UNGA on Post-2015 Agenda	
Sep 2015	High-Level Political Forum Meeting	
c.Jul-Sep 2015	UN General Assembly Post-2015/MDG Review Summit	
Jan 2016	New Post-2015 framework in place	

Appendix B: Composition of Key Development Issues

This shows the component words/terms that were aggregated to form the 25 key development issues reported in the main text. Coverage is not comprehensive of all possible terms and issues but as noted in the main text, terms and issues were developed on the basis of both word counts and broader literature review.

Figures represent the percentage and absolute change in mentions per 10,000 words in moving from MDG to PTDA core documents. Where there were zero counts in the MDG documents, the percentage change is shown here as 1000%, though this was not used in aggregate calculations.

DEVELOPMENT GOALS		% Change	Absolute Change
MDGs 1-6	Poverty	16%	4.0
	Hunger	118%	2.0
	Education	33%	4.6
	Child	-14%	-2.5
	Women	95%	9.7
	Gender	94%	4.8
	Girl	-34%	-2.1
	Maternal	-39%	-1.0
	Health	34%	5.4
	Mortality	-48%	-2.7
	HIV/AIDS	-83%	-9.1
	Malaria	-56%	-1.7
Growth and Enterprise	Growth	34%	4.5
	Enterprise	26%	0.2
	Entrepreneur	12%	0.1
	Employ*	48%	2.4
	Job	354%	9.0
Rural/Agricultural Development	Agric*	56%	3.8
	Rural	140%	3.3
Urban Development	Urban	50%	2.2
	City/Cities [whole words]	0%	0.0
Institutional Development	Governance	27%	2.0
	Institution	55%	5.5
	Politic*	-11%	-1.0
Rights and Justice	Justice	504%	4.3
	Rights	72%	7.6
	Social Justice	40%	0.2
Livelihoods	Livelihood	359%	4.6
	Capabilit*	80%	0.8
	Vulnerab*	34%	2.0
Migration	Migra*	869%	7.4
Manufacturing	Manufacturing	-66%	-0.7
Services	Services	86%	6.4

Infrastructure	Infrastructur*	30%	1.2
Insecurity	Conflict	-43%	-4.7
,	Humanitarian	-91%	-5.0
	Violen*	203%	5.6
	War(s) [whole words]	-97%	-7.6
	Peace	-3%	-0.3
	Security	70%	5.8
MDG 8	Trade	0%	0.0
	Least developed	-47%	-3.9
	Landlocked	25%	0.5
	Small island	6%	0.2
	Debt	-60%	-8.6
	Drug	-82%	-5.9
Wellbeing	Psychol*	0%	0.0
	Happy/Happiness	-100%	-0.4
	Well-being/Wellbeing	55%	0.9
Environment and Sustainability	Environment*	44%	10.4
	Sustainab*	496%	78.8
	Climate Change	381%	7.3
	Energy	490%	14.5
	Disaster	48%	2.4
	Waste	414%	6.1
Open Development	Open [not Copenhagen]	85%	3.8
	Transparen*	288%	6.1
	Accountab*	363%	13.1
	Corrup*	69%	1.0
Inclusive Development	Inclusi*	1048%	15.5
	(In)equalit*	201%	9.4
	Exclusion/Excluded	968%	2.1
	Diversity [whole word]	125%	1.9
	Grassroot	1000%	0.2
	Disab*	1530%	3.2
DEVELOPMENT MECHANISMS			
Informatics	ICT [specific term]	-48%	-2.6
	Information	29%	2.5
	Digital	-89%	-3.8
	Data	128%	5.1
	Mobile	153%	0.6
Technovation	Scien*	265%	5.6
	Technol*	56%	7.6
	Innovati*	305%	6.5
Traditional Development Finance	Aid [whole word]	-35%	-4.0
	ODA	-41%	-2.1

	Donor	-44%	-2.6
New Development Finance	Тах	153%	2.6
	Remittance	1000%	1.0
	Philanthrop*	181%	1.2
New Stakeholders	Business	392%	10.0
	Communit*	9%	1.2
	Stakehold*	1010%	8.6
	Cooperation	222%	10.8
	Partnership	348%	28.0
	Collab*	46%	1.0
	Particip*	72%	5.5
Development Projects	Implementation	609%	16.8
	Delivery	181%	0.8
	Management	71%	3.9
	Process*	321%	12.3
	Evaluat*	-58%	-1.5
	Monitor	130%	5.5
Development Strategy	Strateg*	-45%	-7.5
	Law	77%	3.4
	Policy/Policies	0%	0.0
DEVELOPMENT PERSPECTIVES			
Complex Adaptive Systems	Resilien*	1000%	5.0
	Complex/Complic*	-58%	-2.5
	Agile	0%	0.0
	Uncertain	1000%	0.6
	Volatil*	181%	0.8
	System*	88%	17.9
	Connec*	-5%	-0.2
	Adapt*	45%	1.1
	Shock(s) [whole words]	181%	1.2
	Risk	119%	4.8

Appendix C: Difference Between MDGs and Post-2015 Documentation for Individual Terms

This table includes all terms aggregated into main issues, plus some others. As with Figure 10, the statistic shown is created in the following manner:

- 'A' represents the absolute difference in frequency of occurrences per 10,000 words, subtracting the MDG figure from the PTDA figure
- 'R' represents the relative difference for these statistics: subtracting the MDG figure from the PTDA figure and then dividing by the MDG figure
- The standard deviation of A and R is calculated for all data shown (a somewhat roughand-ready calculation given the data is unlikely to be normally distributed): SA and SR.
- The measure shown is calculated as the average deviation of each entry: ((A/SA) + (R/SR))/2

Term	MDG to PTDA Difference
Sustainab*	5.8
Disab*	3.0
Inclusi*	2.9
Stakehold*	2.4
Partnership	2.4
Implementation	2.2
Resilien*	2.2
Social Protection	2.1
Migra*	2.1
Exclusion/Excluded	1.9
Learning	1.9
Energy	1.8
Renewable	1.6
Media [whole word]	1.6
Accountab*	1.5
Geograph*	1.5
Transform	1.4
Process*	1.4
Business	1.3
System*	1.3
Job	1.2
Justice	1.2
Impact	1.2
Climate Change	1.2
Waste	1.1
Cooperation	1.1
Food	1.1
Finan*	1.0
Innovati*	1.0
(In)equalit*	1.0

Term	MDG to PTDA Difference
Livelihood	0.9
Social	0.9
Transparen*	0.9
Scien*	0.8
Women	0.8
Environment*	0.7
Violen*	0.7
Money	0.6
Rights	0.6
Monitor	0.6
Land [whole word]	0.6
Technol*	0.6
Services	0.6
Data	0.6
Public	0.5
Risk	0.5
Security	0.5
Gender	0.5
Particip*	0.5
Rural	0.5
Institution	0.4
Тах	0.4
Minorit*	0.4
Commodit*	0.4
Philanthrop*	0.4
Shock(s) [whole words]	0.4
Health	0.4
Open [not Copenhagen]	0.4
Nutrition	0.4
Delivery	0.4
Volatil*	0.4
Youth	0.4
Green	0.4
Management	0.4
Law	0.4
Education	0.3
Diversity [whole word]	0.3
Growth	0.3
Hunger	0.3
Emerging	0.3
Agric*	0.3
Skill	0.3
	t

Term	MDG to PTDA Difference
Mobile	0.3
Regulat*	0.3
Local	0.3
Resource	0.3
Poverty	0.3
Food Security	0.3
Employ*	0.2
Disaster	0.2
Urban	0.2
Carbon	0.2
Sanitation	0.2
Information	0.2
Capabilit*	0.2
Vulnerab*	0.2
Corrup*	0.2
Governance	0.2
Well-being/Wellbeing	0.2
Fragil*	0.2
Adapt*	0.2
Collab*	0.1
Faith	0.1
Infrastructur*	0.1
Water	0.1
Communit*	0.1
Social Justice	0.1
Landlocked	0.1
Bank*	0.1
Enterprise	0.1
Civil Society	0.1
Market	0.0
Entrepreneur	0.0
Small island	0.0
Productivity	0.0
Economic	0.0
Agile	0.0
Trade	0.0
City/Cities [whole words]	0.0
Policy/Policies	0.0
Connec*	0.0
Citizen	0.0
Peace	0.0
Universit [*] [not citations]	0.0
Free*	-0.1

Term	MDG to PTDA Difference
Politic*	-0.1
Emotion	-0.1
Crisis/crises	-0.1
Government	-0.1
Leaders*	-0.1
Culture [whole word]	-0.1
Maternal	-0.1
Ethic*	-0.1
Religi*	-0.1
Норе	-0.2
Female	-0.2
Manufacturing	-0.2
Child	-0.2
Girl	-0.2
Evaluat*	-0.2
Malaria	-0.2
ODA	-0.2
Happy/Happiness	-0.2
Chao*	-0.2
Moral [not morale]	-0.2
Donor	-0.2
ICT [specific term]	-0.2
Private	-0.3
Mortality	-0.3
Complex/Complic*	-0.3
Competit*	-0.3
Commerce	-0.3
Comput*	-0.3
Terror*	-0.3
Population	-0.3
Non-gov/NGO	-0.3
Aid [whole word]	-0.3
Least developed	-0.3
Militar*	-0.3
Investment	-0.4
Conflict	-0.4
Network	-0.4
Digital	-0.4
Humanitarian	-0.4
Drug	-0.5
Strateg*	-0.6
Nuclear	-0.6
INULICAL	-0.0

Term	MDG to PTDA Difference
War(s) [whole words]	-0.7
State(s) [whole words]	-0.7
HIV/AIDS	-0.7
Weapon	-0.7

The table excludes almost all those terms which did not appear in the MDG documents (and for which the calculation will not work since it involves dividing by zero): woman, psychology, oil, energy security, grassroot, broadband, tablet, laptop, social media, remittance, insurance, corporate social, agile and uncertain. All of these appear less than ten times in the PTDA documentation. The table <u>includes</u> just two of such terms – resilience, and social protection – since they appear more than 30 times in the PTDA documentation; as in Appendix B, their percentage change was recorded as 1000% in order to enable the calculation.