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Travelling with the GDP through early development economics' history

Daniel Speich

Abstract

In the vast body of development theoretical knowledge one element has been of a considerable longevity: the abstraction of a Gross Domestic Product to represent a given economic entity. This paper suggests approaching the history of development thinking by travelling with the GD

A vast body of literature exists on how socio-economic change in weak economies can be accelerated. This is the central question in the development discipline around which intellectual activities have been revolving for over half a century. The research project of which this paper is a part aims at reconstructing a historical narrative concerning the role of science and technology in development. And because the field is so large, it seems helpful to start research by looking at formal aspects of knowledge production, rather than at the contents. Instead of aligning different leading dogmas of development, it is thus suggested to look at modes and techniques of knowledge production.

One element in the vast body of development theoretical knowledge has been of a considerable longevity. It is the abstraction of a Gross Domestic Product to represent the productivity of a given economic entity. My methodological argument states that the history of development thinking can be approached by travelling with the GDP through this discourse. To put the metaphor to its limits: one could

created the seamless space, in which GDP and other macroeconomic abstractions travel easily.

I. Methodical travelling: finding a narration

The material, or the case, on which to focus, is the genesis of a global "Development Machine"[2] since World War II. The productivity of the "travelling"-approach for narrating the past of the post-colonial development endeavour may become visible, if it is contrasted to some existing, older accounts of the field. The apparatus of development was initially conceptualized as a strategic element in the Cold War and it transported key elements of the Western model of a Keynesian welfare state. Necessary conditions for the emergence of the postcolonial practice of development were an unrestricted trust in science and technology, a strong state, a stable and clearly regulated international economic order and the assumption, that socio-economic change can be planned, induced and controlled.

By the 1970s, most of these conditions were seriously called into question. But, quite surprisingly, the business of development gained further momentum and is still with us today in the 21st Century. Net aid flows still rose in the 1980s, even though it became more and more evident that the whole endeavour did not meet its objective satisfactorily, and continued to rise towards the turn of the millennium after a short pause in the early 1990s.[3] Meanwhile, development theory evolved into a lively field of highly differentiated analysis and debate, including questions concerning low aid efficiency, the problems of structural adjustment, a new interest in non-governmental organizations, intermediate and appropriate technologies, rural development, local participation and gender issues. The complex

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[2] James Ferguson, *The Anti-Politics Machine. Development, Depoliticization, and Bureaucratic Power in Lesotho* (Cambridge [etc.], 1990).
[3] Figures from http://stats.oecd.org (download January 2006).

system of international technical cooperation and foreign aid has become a powerful element within the socio-economic reality of almost all recipient countries. At the same time its fundraising activities have strongly influenced the public image of the Third World within donor societies. The aid industry can be understood as a new global culture, within which forms of economic knowledge play a key role.

What are the reasons for the persistence of the development endeavour? What explanations can be found in the existing narrations of the field's history?

Development has been the subject matter of vast historical literature. Textbooks of development economics often include an overview of the historical succession of doctrines. These accounts reconsider the previously predominant doctrines in close relation to the development schemes that were installed. Thus, they have a tendency to qualify earlier thinking in terms of its practical success. The dominant mode of historical reasoning seems to be the quest for "lessons" to be learned from the past in order to gain new directions for the future.[4] However, after five decades of development theory and practice, there are many contradictory lessons available and it is not easy to see a cumulative progress in knowledge concerning the problems at hand. In fact, since around 1980 a body of literature has evolved around the alleged "death of development".[5]

publication by an insider went as far as qualifying the whole history of the endeavour as an “elusive quest for growth”.[6]

Some accounts attribute the very stability of the development endeavour to the fact that poverty and inequality still prevail on a global scale. This would mean assuming th

space for the capitalist logic of the market. Lessons from these historical accounts amount to a call for abandoning the endeavour completely.[9]

While this rich historiography has doubtlessly produced many important insights, the situation still remains unsatisfying. The relative impact of moral, financial and political factors in aid giving is difficult to weigh and at the same time highly contested. It seems important to ask for the conditions of the possibility of such debates. I would thus suggest shifting the analytical perspective away from the donors' and recipients' motives towards a more formal account. The mode of existence of the postcolonial "Development Machine" is defined by the production, diffusion and reformulation of scientific and technical expertise.[10] A shared set of analytical tools, concepts and categories has emerged, which worked as a common language for antagonistic players to express their different views on the aims and ways of aid. And in this, I assume that the discipline of economics has played a crucial role. The perception and analysis of global inequality have given rise to a world-wide communicative community of actors engaged in development economic issues.

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[9] Scott, *Domination and the Arts of Resistance: Hidden Transcripts*; Wolfgang Sachs, "Introduction," in *The Development Dictionary. A Guide to Knowledge as Power*, ed. Wolfgang Sachs (London, New York, 1992); Arturo Escobar, "Imagining a Post-Development Era," in *Power of Development*, ed. Jonathan Crush (London, New York, 1995).

[10] A rich literature describes the cultural cohesion of the development industry. See for example Richard Harper, *Inside the IMF. An Ethnography of Documents, Technology and Organisational Action* (San Diego (etc.), 1998); Colette Chabbott, "Development Ingos," in *Constructing World Culture. International Nongovernmental Organizations since 1875*, ed. John Boli and George M. Thomas (Stanford, 1999); Emma Crewe and Elizabeth Harrison, *Whose Development? An Ethnography of Aid* (London [etc.], 1998); David Mosse, *Cultivating Development. An Ethnography of Aid Policy and Practice* (London, 2005); Alan Rew, "The Donors' Discourse. Official Social Development Knowledge in the 1980s," in *Discourses of Development*, ed. Ralph David Grillo and R. L. Stirrat (Oxford [etc.], 1997); James Ferguson, "Anthropology and Its Evil Twin: 'Development' in the Constitution of a Discipline," in *International Development and the Social Sciences. Essays on the History and Politics of Knowledge*, ed. Frederick Cooper and Randall Packard (Berkeley, Los Angeles, London, 1997); Timothy Mitchell, *Rule of Experts. Egypt, Techno-Politics, Modernity* (Berkeley, 2002); Richard Rottenburg, "Accountability for Development Aid," in *Facts and Figures. Economic Representations and Practices*, ed. Herbert Kalthoff, Richard Rottenburg, and Hans-Jürgen Wagener (Marburg, 2000); Richard Rottenburg,

The beginnings of development economics can be located in the 1940s. In the context of a new post-war world order, economic change in poor countries quickly gained political importance and thus attracted scientific attention. The new focus was most influentially expressed in the inaugural address of Harry Truman in January 1949, in which the US president stated as a fourth point of his foreign policy "a bold new program for making the benefits of our scientific advances and industrial progress available for the improvement and growth of underdeveloped areas."[11] The scientific response was considerable. And the economics profession was especially challenged by the topic. What had been at the core of economic thought in the times of Adam Smith, namely the advancement of material progress, had somehow disappeared from the modern economists' sight because of their preoccupation with equilibrium properties.[12] With the Truman statement, increasing wealth in terms of economic growth quite suddenly re-entered the scene under the label of development. Within the framework of an economic theory of growth, the new discipline of development economics emerged and quickly rose to prominence. Scholars in the field promised no less than to formalize the secret of Western economic success in such a way that it would become applicable across international borders and could help to level the inequalities that had been built up by colonial rule.

Anthropologists of development have repeatedly highlighted the significance of written reports and the importance for all agents to keep up with the pace of changing key concepts.[13] Thus, the aid business

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[11] Dennis Merrill, ed., *The Point Four Program: Reaching out to Help the Less Developed Countries*, vol. 27, Documentary History of the Truman Presidency (Bethesda, Md., 1999), p. 4f.

[12] Heinz W. Arndt, *The Rise and Fall of Economic Growth. A Study in Contemporary Thought* (Melbourne, 1978). See also Peter J. Boettke and Steven Horwitz, "The Limits of Economic Expertise. Prophets, Engineers, and the State in the History of Development Economics," *History of Political Economy* 37 (2005), p. 26; Bruna Ingrao and Giorgio Israel, *The Invisible Hand. Economic Equilibrium in the History of Science* (Cambridge MA, 1990).

[13] Philip Quarles van Ufford, "Knowledge and Ignorance in the Practices of Development Policy," in *An Anthropological Critique of Development: The Growth of Ignorance*, ed. Mark

has constituted itself as a knowledge industry which reached a critical level of internal cohesion towards the end of the 1960s. From that moment onward the discipline was quite stable and grew steadily despite rather unfavourable changes in its politico-economic environment. While aid flows were characteristically directed from donors to recipients, the flows of knowledge followed more chaotic lines, as they included field research as well as productive reinterpretations of norms and prescriptions in local recipient contexts.

Over the last five decades, the international development discourse has become an important source of cultural identity in metropolitan headquarters as well as in urban and rural areas of poor countries. One is confronted with a global phenomenon, which most probably cannot be reduced to a "hidden transcript" of neo-colonial domination.[14] Rather, I would argue, the "Development Machine" has become part and parcel of the actually existing condition of globality as described by Michael Geyer and Charles Bright.[15] Like other agents of global convergence, it bears witness to the high degree of global cultural and economic integration that has been achieved in the last decades. At the same time it is one prominent arena for asserting difference and rejecting sameness around the planet.

The international development endeavour has a history that does not match past future prospects of westernising the world. The failures of implementing core elements of Modernization Theory abound. And neither can its past be reconstructed as a tragic story of negating otherness, because development has been an important factor in the evolution of multiple modernities. Development has a double face of

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Hobart (London, New York, 1993); Terje Tvedt, *Angels of Mercy or Development Diplomats? Ngos & Foreign Aid* (Trenton, N.J., 1998).

[14] See James C. Scott, *Domination and the Arts of Resistance: Hidden Transcripts* (New Haven [etc.], 1990).

[15] Michael Geyer and Charles Bright, "World History in a Global Age," *American Historical Review* 100 (1995).

unity and diversity. Neither the telos of enlightened universalism nor the

concrete scientific practice.[19] Shedding light on the instruments and procedures with which early development economists explored their topics and conceived development as an object of knowledge makes visible rather unexpected instances of continuity. Of course, the prominence of the notion of GDP per capita in development discourse has been observed – and criticised – repeatedly. However, these technical formulations have not very often been put to the centre of a historical narration of the field. Instead, the received accounts of the history of development thinking usually focus on paradigm shifts, say from Modernization to Dependency Theory and then to the neo-liberal concept of structural adjustment. The fact, that all of these models and theories based their assumptions on data gained through the procedures of national accounting has largely been overlooked. It seems important to insist on the analysis of the technical level as it offered a source of considerable stability across all changes in theoretical modelling. Arthur Lewis and Walt Rostow, Raul Prebisch and Andre Gunder Frank, just as well as World Bank's John Williamson, who coined the „Washington Consensus" in 1990, to name just a few, based their arguments on figures like the Gross Domestic Product and on indicators derived from it.

However, the technical history of development economics not only shows surprising continuity, bu

development thinking as gradually evolving in complexity, is, to say the least, imprecise. Already in the so-called technocratic early years, i.e. the 1940s and 1950s, there were rich and elaborate debates about the limits of the GDP-approach. In fact, these debates formed the intellectual environment, in which the procedures of national accounting were initially shaped. As a framework of inquiry the national accounts deployed a tendency to reproduce themselves and to gain stability by aggregating links to other forms of economic knowledge production and to economic policy. In the 1960s, however, debating the accounting systems became a specialised task for applied economists and statisticians while theoretical economists and policy advisors started to take the figures for granted. A specific division of academic labour came into existence, which was instrumental in the rise of technocratic approaches towards the complex question of economic change.

I assume that these practices, irrespective of their success in advancing general welfare on the planet, have been important in structuring not only development thinking on all sides of the political spectrum, but also in changing the socio-economic realities of a large part of the world. A shared set of notions concerning economic difference and change emerged, which gave rise to new global imaginations and new local imaginaires of the world. Development historiography needs to be complemented by a genealogy of these world-views.

How could such a genealogy look like? In the following paragraphs the genesis of the GDP-concept is briefly sketched, and it is asked, in what way it allowed for macroeconomic facts to travel around the globe. GDP per capita is a highly contested indicator for development – but despite the many critiques it is still in use today.

Three reasons will be given why the concept has proved to be so stable.

II. Analytical travelling:

incomes, expenditure, or outputs, which in a closed system must sum up to an equal amount. If the results were then related to population figures, income groups could be formed and the social distribution of wealth could be displayed accordingly.

To put it in the terms suggested by Bruno Latour, these procedures can be seen as “inscription devices” which generated a new kind of visibility.[23] In so far as they referred to increasingly complex phenomena not accessible otherwise, one is tempted to attribute to them a productivity that exceeds mere representational mechanisms.[24] They shaped the realm of economic transactions in an engineering perspective which allowed for specific policy interventions. And they set up a comparative framework in which the organization of one economic entity could easily be compared to the institutions of another economic sector, or to another nation.

In 1933, Simon Kuznets stressed the usefulness of computing gross economic totals as an instrument to “appraise the prevailing economic organization in terms of its returns”. In other words, estimating the end product of a country’s economic activity gave rise to the question, whether a change in economic organization would lead to a change in returns.[25] Evidence for such inquiries could be gathered in principle through comparative investigations. By offering more or less stable inscriptions of the condition of one economic entity at one point in time, the accounting procedures made it possible to relate several such inscriptions to each other. To take up Bruno Latour’s vocabulary again,

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[23] Bruno Latour, *Science in Action. How to Follow Scientists and Engineers through Society* (Cambridge Mass., 1987), p. 68.
[24] Mary Morgan, "Perspective. Making Measuring Instruments," in *The Age of Economic Measurement*, ed. Judy L. Klein and Mary Morgan, Ann. Suppl. To Vol 33 of History of Political Economy (Durham, London, 2001).
[25] Simon Kuznets, "National Income," in *Encyclopedia of the Social Sciences*, ed. Edwin R. A. Seligman (New York, 1933), p. 205. See also Mark Perlman, "Political Purpose and the National Accounts," in *The Politics of Numbers*, ed. William Alonso and Paul Starr (New York, 1987), and Vibha Kapuria-Foreman and Mark Perlman, "An Economic Historian's Economist: Remembering Simon Kuznets," *The Economic Journal* 105 (1995).

“cascades of inscriptions” could be arranged through which economic facts would move in the form of “immutable mobiles”. [26]

One important step in this direction was to take total income for a given year (as measured in terms of the Gross Domestic Product), and then connect the resulting figure to estimates of earlier years, thus composing a time series out of which yet another inscription could be derived, namely a rate of growth.[27] However, Kuznets was quite sceptical towards this kind of mobilization of facts. Comparing different sets of national accounts was in his view very difficult because he considered the scope of economic activity within a given society to be essentially contingent. He remarked with emphasis: “Being conditioned by the institutional set up of the family and of economic society, the line between economic and non-economic activity shifts from country to country and from time to time”[28]. The measuring procedures of income accounting thus had to reflect the socio-cultural structure of the entity it wanted to depict. It had to be grounded in local specificities and in the contingency of history. In fact, it was Kuznets’ conviction that one had to design a specific procedure of quantification for each entity in time and space. This of course rendered the comparison of data rather problematic.

How well do facts travel? For Kuznets, an economic abstraction like the GDP could not easily be cut off from its locus of origin. But for other authors in the field, the power of national accounting lay precisely in the drive towards international comparison. The problem of generalizing national income accounting was one of the main interests of Colin Clark who is said to have been among the first economists to

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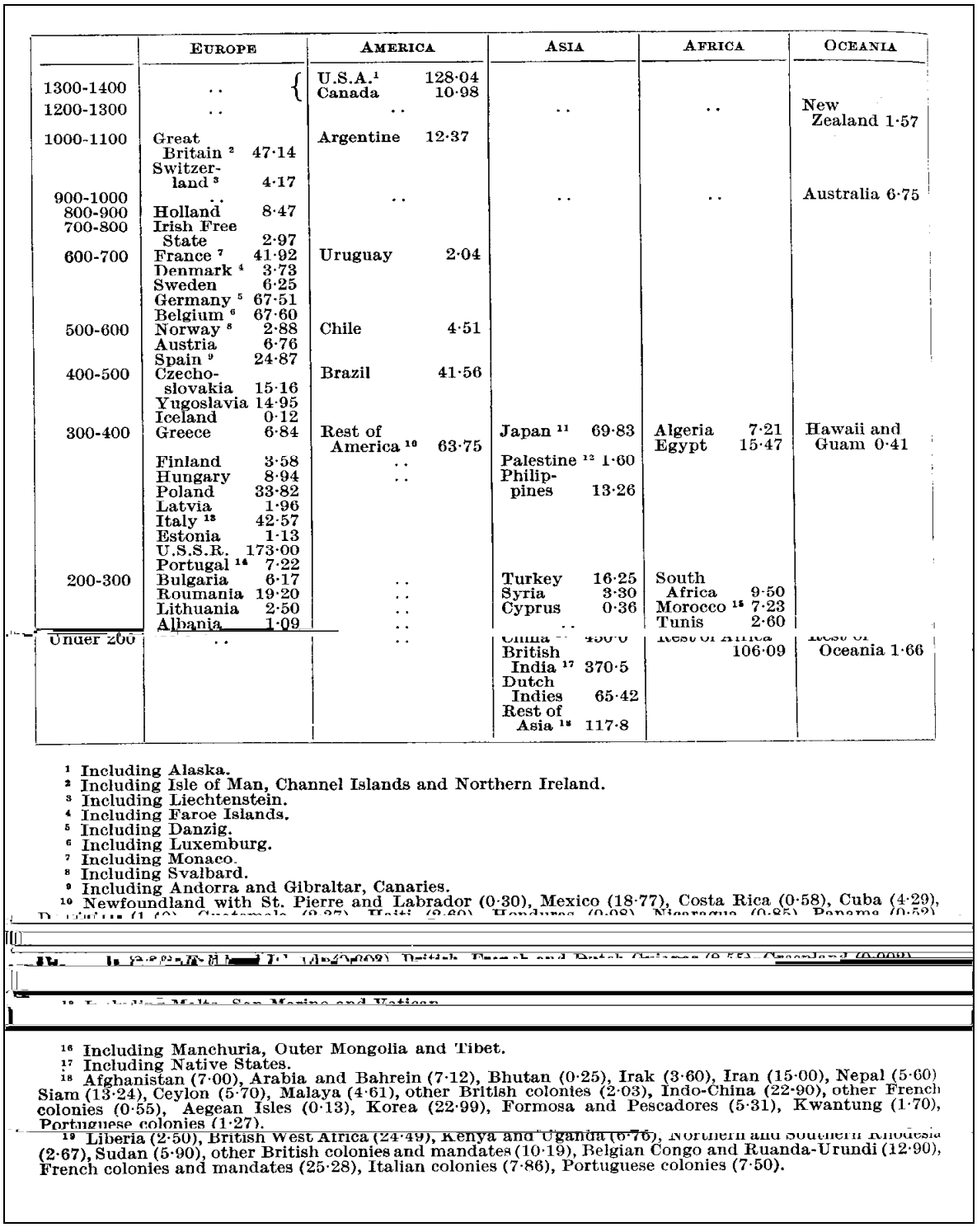
[26] Bruno Latour, "Drawing Things Together," in *Representation in Scientific Practice*, ed. Michael Lynch and Steve Woolgar (London, 1990), p. 27.
[27] For the history of statistical time series see Judy L. Klein, *Statistical Visions in Time. A*

think in terms of an annual growth rate of real income per head of population.[29] His notion of “GDP per capita” (GDP divided by population size) became one of the centrepieces of economic theories of growth



	EUROPE	AMERICA	ASIA	AFRICA	OCEANIA
1300-1400	..	U.S.A.[1] 128·04 Canada 10·98			
1200-1300	..	..	..	..	New Zealand 1·57
1000-1100	Great Britain [2] 47·14 Switzerland [3] 4·17	Argentine 12·37			
900-1000	..	..	..	..	Australia 6·75
800-900	Holland 8·47				
700-800	Irish Free State 2·97				
600-700	France [7] 41·92 Denmark [4] 3·73 Sweden 6·25 Germany [5] 67·51 Belgium [6] 67·60	Uruguay 2·04			
500-600	Norway [8] 2·88 Austria 6·76 Spain [9] 24·87	Chile 4·51			
400-500	Czechoslovakia 15·16 Yugoslavia 14·95 Iceland 0·12	Brazil 41·56			
300-400	Greece 6·84 Finland 3·58 Hungary 8·94 Poland 33·82 Latvia 1·96 Italy [13] 42·57 Estonia 1·13 U.S.S.R. 173·00 Portugal [14] 7·22	Rest of America [10] 63·75	Japan [11] 69·83 Palestine [12] 1·60 Philippines 13·26	Algeria 7·21 Egypt 15·47	Hawaii and Guam 0·41
200-300	Bulgaria 6·17 Roumania 19·20 Lithuania 2·50 Albania 1·09	.. ..	Turkey 16·25 Syria 3·30 Cyprus 0·36 ..	South Africa 9·50 Morocco [15] 7·23 Tunis 2·60	
Under 200	..	..	China ... 450·0 British India [17] 370·5 Dutch Indies 65·42 Rest of Asia [18] 117·8	Rest of Africa 106·09	Rest of Oceania 1·66

[1] Including Alaska.
[2] Including Isle of Man, Channel Islands and Northern Ireland.
[3] Including Liechtenstein.
[4] Including Faroe Islands.
[5] Including Danzig.
[6] Including Luxemburg.
[7] Including Monaco.
[8] Including Svalbard.
[9] Including Andorra and Gibraltar, Canaries.
[10] Newfoundland with St. Pierre and Labrador (0·30), Mexico (18·77), Costa Rica (0·58), Cuba (4·29),

[16] Including Manchuria, Outer Mongolia and Tibet.
[17] Including Native States.
[18] Afghanistan (7·00), Arabia and Bahrein (7·12), Bhutan (0·25), Irak (3·60), Iran (15·00), Nepal (5·60) Siam (13·24), Ceylon (5·70), Malaya (4·61), other British colonies (2·03), Indo-China (22·90), other French colonies (0·55), Aegean Isles (0·13), Korea (22·99), Formosa and Pescadores (5·31), Kwantung (1·70), Portuguese colonies (1·27).
[19] Liberia (2·50), British West Africa (24·49), Kenya and Uganda (6·76), Northern and Southern Rhodesia (2·67), Sudan (5·90), other British colonies and mandates (10·19), Belgian Congo and Ruanda-Urundi (12·90), French colonies and mandates (25·28), Italian colonies (7·86), Portuguese colonies (7·50).

Figure 1: Income groupings of the countries of the world. Average yearly income per head 1925-34 is given in an artificial unit in the left column. Population figures for 1935 are given in millions next to the country's name. (Clark 1940, p. 54)

His work had a huge impact on development economics because it so impressively visualized the differences in wealth among the countries of the world. This message seems to have been strong enough to not only promote its contents, but also the means and media of their production. The United Nations and its Statistical Office started to publish comparable surveys as of 1948.[32] Clarks work and the UN reports helped make national income accounting become the single most important instrument by which development economists henceforth framed their problem. They did so, of course, by duly debating the accuracy of the instrument. And the GDP has remained a contested abstraction in the history of development expertise until today. Even by the early 1950s, scholars confronted with the problems of collecting data were quick to put the use of national income accounting in developing economies into question.

One important debate concerned the influence of international transactions and focussed on the question, whether sum totals should be given in terms of a Gross Domestic Product (GDP) or a Gross National Product (GNP). [33] Another objection stated that the economies of poor states, especially large ones like Brazil or India, lacked internal integration to such an extent that they could not be turned into a meaningful basic unit of analysis. In African countries national markets for factors and for products seemed to be too poorly evolved to use

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[32] Such as a report on “Salient Features of the World Economic Situation, 1945-47” (January 1948), a “Supplement to the Economic Report” (March 1948) and “Selected World Economic Indices” (July 1948). Joseph D. Coppock, "Review of Economic Publications of the United Nations," *The American Economic Review* 39 (1949). See also Michael Ward, *Quantifying the World. UN Ideas and Statistics*, United Nations Intellectual History Project (Bloomington, 2004), p 72ff.

[33] D. A. Lury, "National Accounts in Africa," *The Journal of Modern African Studies* 2 (1964), p. 100. While both conceptions accounted for import and export activities, the domestic conception (GDP) measured total income within national borders and also included the local activity of businesses owned by foreigners. In contrast, the national conception (GNP) measured total income earned by all nationals within the national territory as well as abroad. In industrialized countries GDP and GNP did not seem to vary strongly, because the foreign engagement of nationals was usually as strong as the domestic activity of foreigners. In developing countries however, differences could be considerable due to foreign dominance within the national economy.

local prices in the different regions to aggregate incomes, output, and expenditures, even if a single unit of currency prevailed. Also, the line between gross and net income was hard to draw because depreciation turned out impossible to measure in economies where units of production were generally small and equipment was under constant repair.[34]

Out of the many critical points I would like to focus upon one fundamental complication. It concerned the problem of subsistence activities. Phyllis Deane, a British economist who embarked in 1945 on an eighteen month field trip to Central Africa, wrote in the following 1953 publication on measurement of colonial national income:

> The problem of obtaining adequate data on the rural economies of Africa is the most serious obstacle in the way of framing satisfactory national income estimates for these territories. … The accounting problem is not simply that of the acute scarcity of quantitative data … it is also a qualitative problem, which brings into question the fundamental validity for primitive communities of the social accounting concepts themselves.[35]

Deane was frustrated by the fact that the compilation of national accounts required quantitative information in the form of money prices. But subsistence production and barter trade largely dominated the entities of her study. How to account for economic activity outside the market economy remained controversial for years. Dudley Seers, another practically experienced economist, alluded to the problem in 1952 by calling it “the well-known morass which those estimating national incomes of underdeveloped areas either skirt, rush across, or

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[34] Harry T. Oshima, "National Income Statistics of Underdeveloped Countries," *Journal of the American Statistical Association* 52 (1957), p. 162.
[35] Phyllis Deane, *Colonial Social Accounting* (Cambridge, 1953), p. 115.

die in."[36] Some scholars designed sophisticated methods to render non-monetarised economic activity quantifiable by taking bride-prices into account or by assuming that livestock filled the role of money in pastoral societies.[37] But these techniques were not introduced into the standard procedures of income accounting.

For Seers, as for Deane, the problem was fundamental, because it meant that national income accounts and their sum total did not give a correct picture of the real economic activity. This had, of course, serious consequences for the accuracy of subsequent inscriptions such as international comparisons or growth rates. Also Simon Kuznets warned development economists against relying on "mechanistic, cross-section comparisons of quantitative indexes." Instead, in a 1953 paper he stressed the historical contingency of the experience of each of the economic entities at hand. Such reasoning, he argued, might "at least prevent us from placing too much confidence in a succession of theories that so often magnify partial and transient conditions into universal and immutable factors".[38] Such limits of the national accounting framework appeared also in advanced economies where they mainly concerned the non-accountability of female reproduction work in the household. However, gender aspects of economic activity were considered to be temporary because of the assumption that household work would be capitalized in the further course of social change with technical devices taking over most of the tasks. In the

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[36] Dudley Seers, "The Role of National Income Estimates in the Statistical Policy of an under-Developed Area," *The Review of Economic Studies* 20 (1952), p. 166. See also Melville J. Herskovits, "African Economic Development in Cross-Cultural Perspective," *The American Economic Review* 46 (1956), p. 460.
[37] A. R. Prest and I. G. Stewart, *National Income of Nigeria*, vol. 11, Colonial Research Studies (London, 1953); Harold K. Schneider, "A Model of African Indigenous Economy and Society," *Comparative Studies in Society and History* 7 (1964).
[38] Simon Kuznets, "International Differences in Income Levels: Reflections on Their Causes," *Economic Development and Cultural Change* 2 (1953), p. 26.

development context, gendered economic activities were not addressed before 1970.[39]

Travelling with the GDP through development economics' history brings us to the Ethiopian capital of Addis Ababa in 1961. Here a regional conference of the International Association for Research in Income and Wealth (IARIW) and a Meeting of the UN Economic Commission for Africa took place, at which the accuracy of GDP growth as an indicator of development was a main issue.[40] World leading specialists in the field met to discuss necessary adjustments of the emerging standardized system of national accounts to African realities. In accordance with the cautionary remarks by Kuznets, one of the contributors stressed the fact that the relative importance of subsistence activities within a national economy was to diminish in the course of its development. Thus, if one was to measure only transactions within the market economy and to calculate a growth rate from such yearly totals, the resulting figure would primarily depict a change in the location of the line between "economic" and "non-economic activity", i.e. the expansion of the market economy – but it would not necessarily indicate advances in welfare.[41] However, there was no agreement as to the importance of the complication. The majority of statisticians were quite confident that the problem would be resolved automatically with the market economy further permeating African countries. For them, it did not really matter whether the instrument visualized economic growth or merely market integration, as both processes were thought to be intrinsically linked to economic development.

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[39] Ester Boserup, *Woman's Role in Economic Development* (London, 1970).
[40] Lury, "National Accounts in Africa.", p. 99. The contributions to the IARIW-Conference are

To sum up, GDP as an instrument to visualize international differences in income levels – and hence to depict stages of economic development – deployed a productivity that clearly exceeded mere representational mechanisms. First, it produced a norm. Weakly developed African economies, for example, were carefully analyzed and framed in a way that suited their assumed future compliance with the industrialized model. But the representational techniques did not necessarily depict their present state in an adequate way. Simon Kuznets objected powerfully to this normative approach, measuring instruments necessarily have to rely upon normative instances, which were in this case the structures of the Australian, the British and the American economies of the interwar period.

Second, it produced a homogenous space in which it became possible to acquire comparative knowledge about development issues. One might call this an epistemic space in which the discipline of development economics found its well-suited niche. And its main intellectual currency – so to speak – was the macroeconomic abstraction of national accounting. Notions like the GDP per capita – but also much more sophisticated indicators like the incremental capital-output ratio (ICOR), enabled the experts to travel easily from one developmental case study to another. The performance of the Mexican economy could be used as a benchmark for Nigeria and the East African Community seemed comparable to Indonesia.

Despite the fundamental flaws of its construction, GDP proved to be surprisingly stable and gained, so to speak, a life of its own. When from the early 1970s onwards the desirability of growth and its identity with development came under increased criticism, alternative conceptions were designed to include also social and/or ecological aspects. The latest suggestions are for example a “Green GDP” or the

“Human Development Index” (HDI) promoted by the United Nations Development Programme (UNDP) since 1990.[42] But while economists always were well aware of the shortcomings, there still is no other indicator in economics as universal and as widely accepted as the GDP.

III. Three reasons for the stability of the GDP

Why has the GDP as an index for development proved so stable? Or to put it historically: why have the objections made by Kuznets in the 1930s not prevented GDP per capita from becoming one of the more prominent travelling facts in global economic thought and interactions? I will offer three reasons. The first is internal to economic knowledge production. The second refers to the role of the state. And the third makes a case of the universalism in economic abstraction.

First Reason for Stability:

An Environment for Scientific Experimentation

Modern economics has shaped its venture by emulating other disciplines, most prominently physics and biology.[43] For example, models of circular flows have a long history in economic thought. It has been a major concern of economists in the early decades of the 20th century to describe more precisely economic life as (quote Ragnar

total income, total capital and total labour.[47] This line of reasoning did not only generalize specific findings in space but it also worked in the

growth through the process of capital accumulation. In a simplified form, assuming that GDP growth is proportional to the share of investment spending in GDP, development economists used the model widely to calculate the investment rate required to achieve a given target growth rate for an underdeveloped economy.[50] Similar modes of generalization could be analyzed for the revised growth model suggested by Robert Solow in the course of the 1950s.[51]

If fed with consistent data, these theories and mathematical formulae converted the problem of development into a technical matter of calculating specific requirements for growth. For early authors like Arthur W. Lewis or Walt W. Rostow who focused exclusively on capital accumulation, the crucial figure was the amount of savings invested compared to total GDP. They argued that Western economic success was due to such a ratio of between 10 and 15% and postulated, that underdeveloped economies could experience a kind of “take-off” into self-sustained growth if they reached a comparable percentage.[52]

Such assertions of course gave rise to heated debate at the time. To name just one line of the debate: Raul Prebisch and Hans Singer soon criticized the internalist view on single economic entities and strongly emphasized the embeddedness of underdeveloped economies in an international “centre-periphery” system.[53] But apparently, these contestations were increasingly detached from the questioning of national income accounting sketched in the section above. In contrast,

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[50] Easterly, *The Elusive Quest for Growth. Economists' Adventures and Misadventures in the Tropics*, pp. 28-29. The name of the model also takes the contributions of the British economist Roy F. Harrod into account which were published in 1939. Roy F. Harrod, "An Essay in Dynamic Theory," *Economic Journal* 49 (1939).
[51] Robert M. Solow, "Technical Change and the Aggregate Production Function," *The Review of Economics and Statistics* 39 (1957). This paper laid the basis for an exogenous growth theory with the central factor of economic growth being technical change.
[52] W. W. Rostow, "The Take-Off into Self-Sustained Growth," *The Economic Journal* 66 (1956); W. Arthur Lewis, *The Theory of Economic Growth* (London, 1955), p. 202.
[53] Raul Prebisch, *The Economic Development of Latin America and Its Principal Problems* (Lake Success NY, 1950); Raul Prebisch, "Commercial Policy in the Underdeveloped Countries," *The American Economic Review* 49 (1959).

the very usefulness of GDP estimates and accounting tables for the

evidence. From the 1960s onwards, their correspondence to socio-political reality, or to what could be imagined as “first nature”, did not have to be problematized anymore by development economic theory. Experts in statistics and applied

be of public interest. Now, data collection, computation and publication of figures became a government task in a constantly increasing number of countries.[57]

In order to ease international comparisons, the problem of different categories and accounting systems had to be tackled. This homogenizing work was done by international organizations like the UN and OEEC who took up the issue and successfully promoted the standardization of the accounts. The UN were interested in a wide spread of accurate national accounts because the estimates were used to establish the share of each member state in financing the organisation. In 1953 the first System of National Ac

prominently stated that governments could improve the overall economic situation by deliberately changing their expenditures.[60] During World War II, Keynes advised the government of Great Britain how to pay for the war. In parallel, though on a somewhat different theoretical basis, the national economy of the United States was re-engineered under the auspices of Simon Kuznets in order to reach the specific

makers. The easy switch between the academic realm and the world of public administration and planning can be shown in the biographies of many economists.

Third Reason for Stability:
Universalism

Searching for reasons for the stability of the post-colonial development concepts leads to questions of political dominance and hegemony. The neo-Marxist tradition of development critique offers some explanations of the phenomenon by referring to Cold War politics. The inherent weakness of the claims of the American Modernization Theory of economic growth and development, so it is argued, has been made up for by its proximity to US power. Indeed, Walt W. Rostow did not hesitate to label his model of growth a “non-communist manifesto”.[64] If the epistemic space of economic knowledge production did not properly correspond to the economic reality of the world of the 1950s, then at least it anticipated the seamless planetary space of capitalist market logic which it was a declared aim of US policy to establish.[65] I do not want to develop here a critique of this analysis of development economics as an instrument of postcolonial US world dominance. The argument has some truth to it, but it seems oversimplified and too unidirectional. In contrast, as a way of conclusion, I would argue that the technocratic language of national

It has become clear, I hope, from my analysis, that the central assumptions of development economics could only become operable by either consciously excluding or simply ignoring the world's manifold cultural differences. This reductionism was Simon Kuznets' most important caveat in the 1930s, when he objected to his colleagues' deliberateness in turning the GDP into a travelling fact. However, in the 1950s, he gave up this systematic doubt and instead proposed a highly sophisticated procedure of making use of the GDP-approach in development economics. An impressive series of articles in the Chicago-based journal *Economic Development and Cultural Change* bears witness of this attempt at allowing the GDP to travel across the North-South-Divide despite the fundamental flaws of the concept.

Economists framed the problem of development in the terms of universal laws of unrestricted applicability. This phenomenon has to be located in the context of the strong universalism promoted by the United Nations, which was expressed in the Universal Declaration of Human Rights in 1948 as well as in the discussions concerning the UNESCO Statement on Race in the early 1950s.[66] Evidently, the fact that different societies enjoyed different levels of economic wealth was known well before Colin Clark presented his tables. And one historically highly loaded explanation for these differences in economic performance had long been given by reference to racial characteristics. The new discourse abstained from such factors. When Simon Kuznets in 1953 listed some explanations for the apparent differences in international income levels, he explicitly rejected the category of race.

For Kuznets, the very ability of any group of human beings to achieve a high level of economic wealth was an anthropological fact. The question to be addressed, then, was that of obstacles hindering

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[66] Staffan Müller-Wille, "Race and Ethnicity. Human Diversity and the Unesco Statement on Race (1950-1951)," (Manuscript, ESRC Centre for Genomics in Society, Univesity of Exeter, UK, 2007).

economic advancement. He basically named three: the difficulty of transferring knowledge across cultural boundaries; the existence of institutions hindering economic profit seeking; and the fact that more advanced economies profited from keeping latecomers low.[67] Thus, while the possibility of development was held universally, its impediments were consigned to historically contingent social institutions and political power relations – which in principle could be overthrown. This construction had, of course, a strong appeal to the leaders of independence movements and to the elites of the new postcolonial states because it so clearly stated the feasibility of change.[68] Indian scholars like V. K. R. V. Rao and P. C. Mahalanobis excelled in the production of policy relevant economical statistics.[69] And the early writings of African intellectuals like Julius Nyerere, Tom Mboya or B. T. G. Chidzero clearly embraced the promises of development economics.[70] The newly independent African states made the advancement of national accounting a core issue on the agenda of the UN Economic Commission for Africa.[71] For them, estimating a Gross Domestic Product for their countries equalled an act of sovereignty. In the mode of macroeconomic knowledge, the very existence of their new political bodies and their developmental potential could be displayed powerfully on the international political stage.

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[67] Kuznets, "International Differences in Income Levels: Reflections on Their Causes", p. 10.
[68] Frederick Cooper, "Modernizing Bureaucrats, Backward Africans, and the Development Concept," in *International Development and the Social Sciences. Essays on the History and Politics of Knowledge*, ed. Frederick Cooper and Randall Packard (Berkeley, Los Angeles, London, 1997).

Thus one could argue that the epistemic space of macroeconomics, in which abstractions like the GDP could easily travel,

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