Measuring *Sustainable Development Return on Investment* of Projects and Programmes

Global Footprint Network
Advancing the Science of Sustainability

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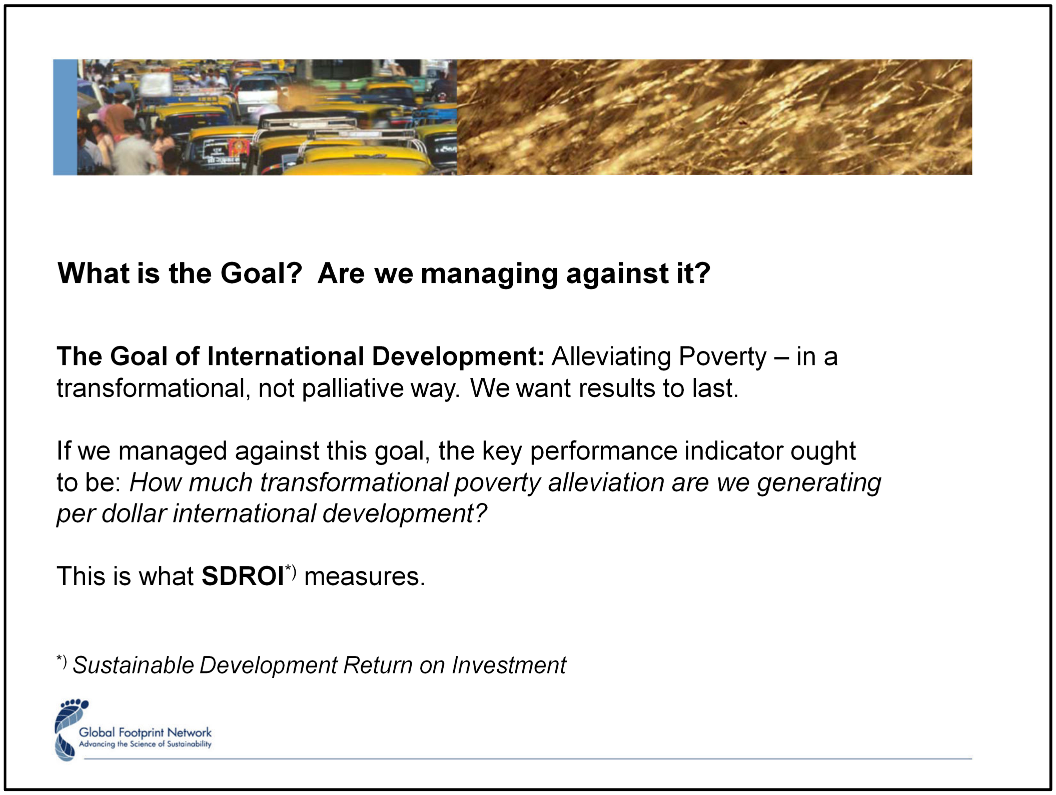


What is the Goal?

The Goal of International Development: ***Alleviating Poverty***. This is the tag line for every larger development institution or donor agency.

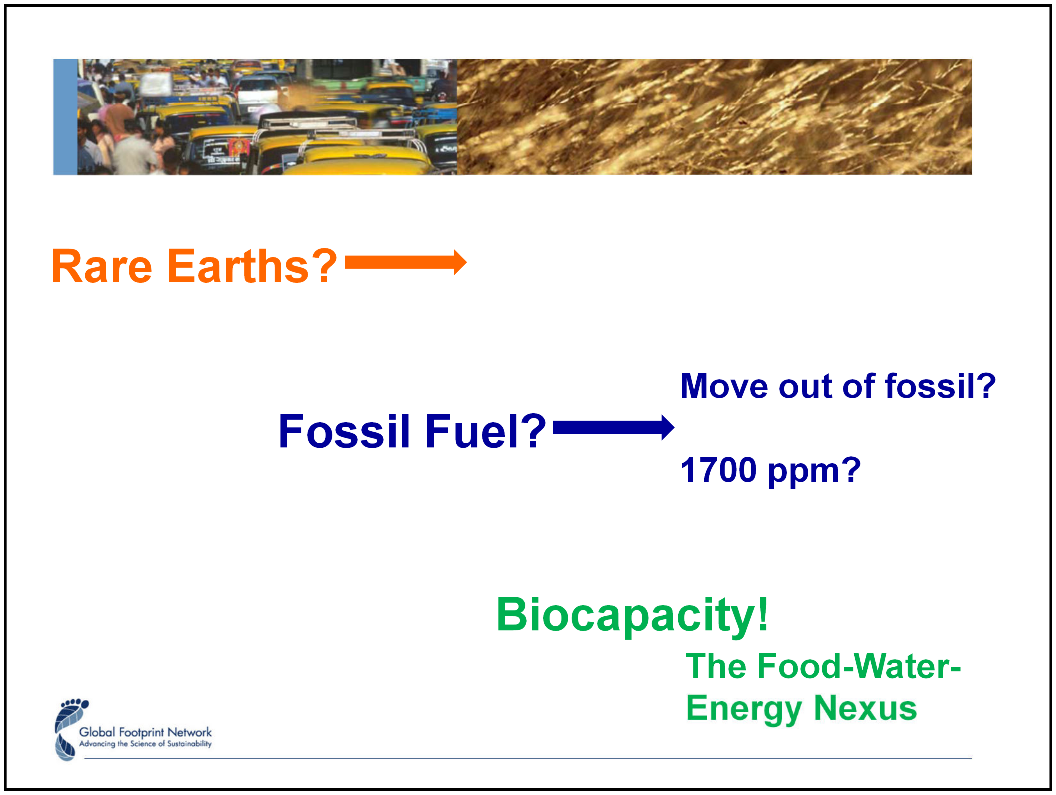
In an increasingly resource constrained world, with trends pointing to an ever more severe mismatch between human demand and resource availability, access to biocapacity is turning into the limiting factor for human development. Without sufficient access, development becomes palliative rather than transformational.

What we therefore need: transformational, not palliative, poverty alleviation. We need to make sure the client population is not just better off for a short time (palliative), but that the population has the ability to regenerate the benefits and maintain or even augment the progress the development impulse has generated (transformational).

This focus on "transformational poverty alleviation" is what's at the core of all global summits' united call for "Sustainable Development." Sustainable development could be called humanity's common dream or necessary goal. The goal of making development sustainable is ubiquitous in the global policy discourse.

The challenge is that few institutions measure their actions against sustainable development. There is a lack of accountability. Hence few if any institution in the human development realm systematically tracks their projects' impact on their program partners' lasting progress. Therefore, we do not know how much sustainable development the annual 150 billion dollars of OECD countries' development assistance buys.

Providing a tool for making transformational poverty alleviation, or sustainable development, measurable, and accountable is the goal and purpose of this initiative. We call the proposed tool "Sustainable Development Return on Investment." This report gives more background on the tool, and explains how it works.



Why biocapacity?

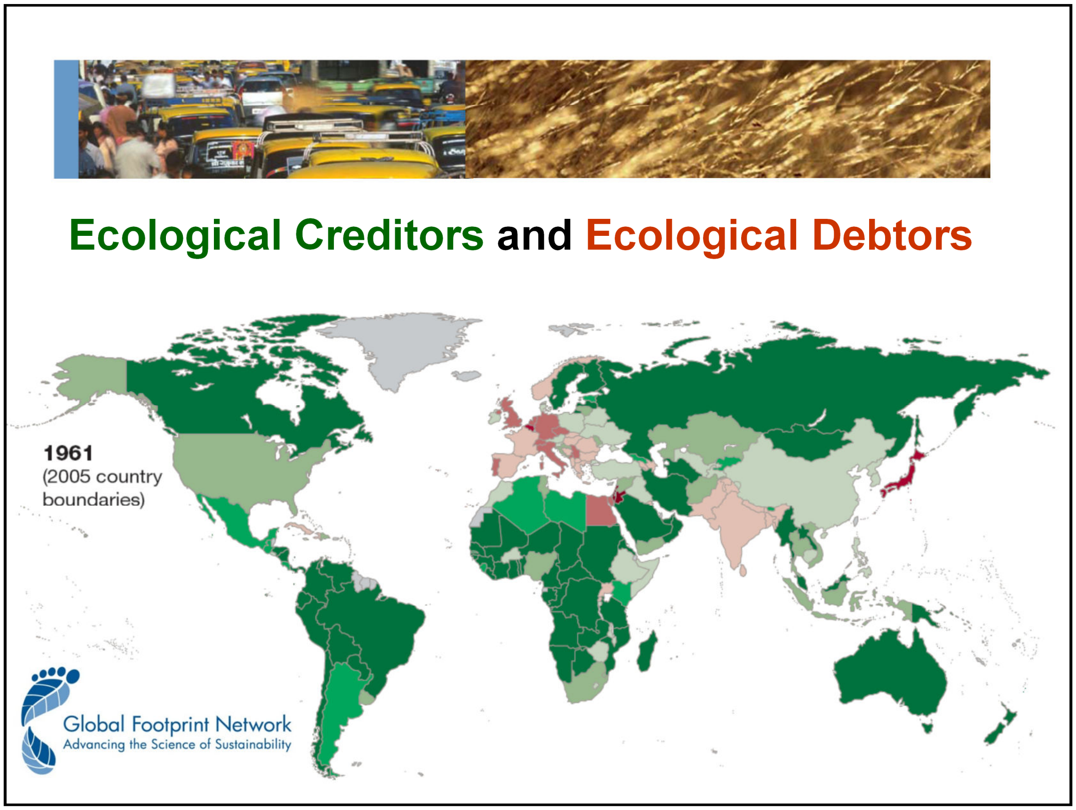
What resource is limiting our ability to secure human well-being?

Is it Rare Earth Metals (particularly special metals like Scandium or Yttrium or Gadolinium http://en.wikipedia.org/wiki/Rare_earth_element) needed for special electronic applications? In the industrial sectors, the limits of rare metals is often considered to be a key bottleneck. But industrial ecology Prof Thomas Graedel from Yale University did an extensive study on those metals. The conclusion: “limiting factor? Not really”. With more energy we can find more special metals (digging deeper, or exploiting lower concentrations).

But do we have the energy? Or is energy the limitation? Currently, fossil fuel is the dominant commercial energy. Is fossil fuel availability then the limitation? In some ways it is (peak oil), but even more so, but in some senses, we may have too much. The reason is that there is not enough biological capacity to use all of it and absorb the corresponding waste. Atmospheric CO_2 concentrations would go to over 1700 ppm if we burnt all fossil fuel we already found (now atmospheric CO_2 concentration is at 400 ppm, up from 270ppm in pre-industrial era).

Whether humanity has the wisdom to move out of fossil fuel quickly (but will need energy substitutes to replace fossil fuel such as biomass) or whether we continue to use fossil fuel and lose biocapacity through climate change, implications are similar: In both cases, biocapacity (the ability to regenerate) is becoming the most limiting factor.

Therefore we say: biocapacity is becoming the currency of the 21st century. It is becoming the limiting ingredient to human well-being.



Today, we are in a new era, defined by biocapacity constraints.

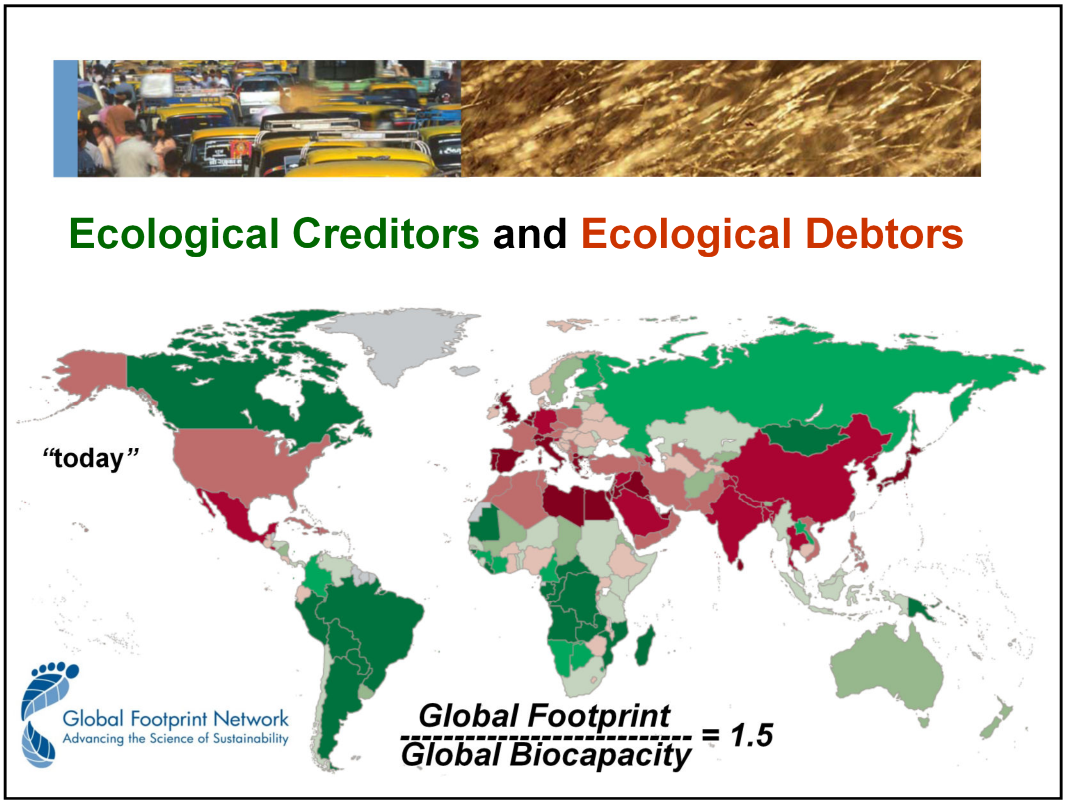
In the old era, as shown on this map here for **1961**, most countries were ecological creditors. Resources were not constraining economies. They seemed plenty.

Residents of ecological creditor countries consume on average less resources than their countries' ecosystems can regenerate (the darker the green the higher the ratio). Note: since there is trade among all countries, both demand and supply are calculated from the perspective of net imports (or net exports).

Ecological debtor countries are in the opposite situation. They run a biocapacity deficit. They use, in net terms, more than what their countries' ecosystems can renew.

FURTHER EXPLANATIONS:

- Ecological Creditors: Residents of ecological creditor countries use less ecological services than are available within their national borders, and therefore are endowed with a reserve of natural assets. This reserve, in an increasingly resource-constrained world, give those countries an economic advantage and strengthens their strategic positions.
- Ecological Debtors**:** In contrast, countries with ecological deficits depend on net imports of such resources or on liquidating their ecological assets. Both are an economic drain on those countries.

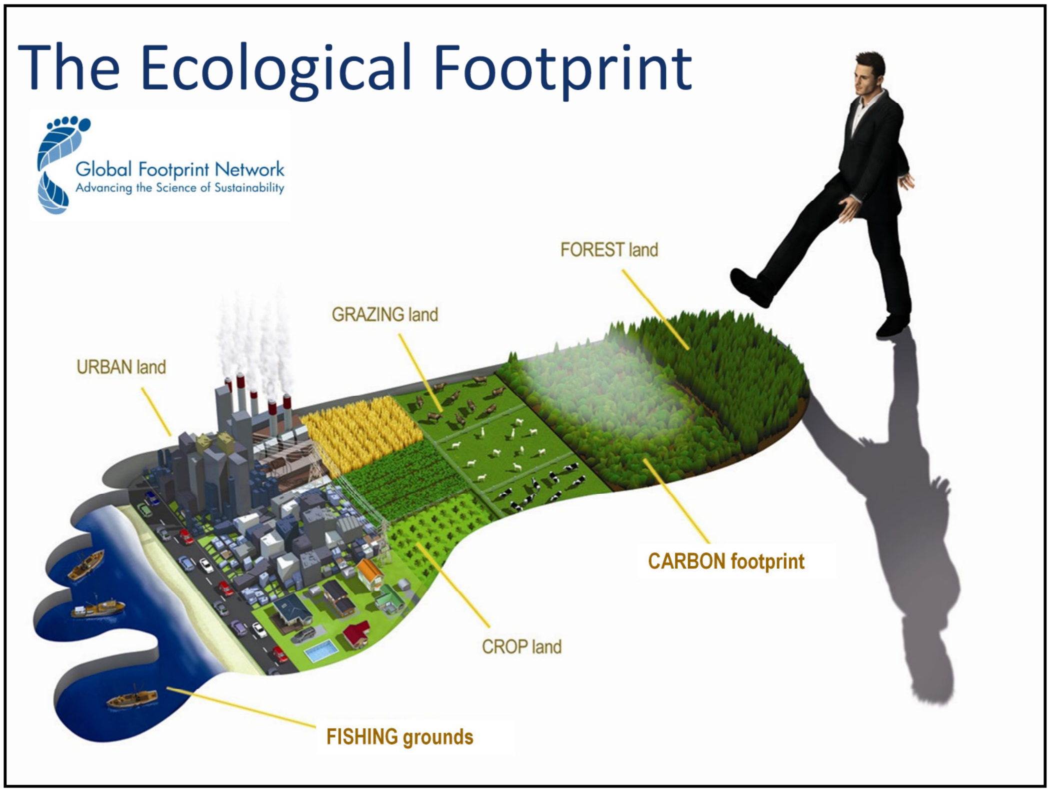


The new era has begun

With global overshoot, and rapidly increasing resource costs since 2000, the situation has shifted. As a whole, humanity's resource demand now exceeds the planet's supply by over 50 percent. This ecological deficit means that it takes a year and six months to regenerate what is being used in one year.

As global overshoot increases, the gap between ecological creditors – countries that have more biocapacity than they use – and ecological debtors – those using more biocapacity than they have is becoming more pronounced, and is turning into an economically a more and more significant divide. Today, 80 percent of the world's people live in countries that run an ecological deficit.

As a result, Global Footprint Network focuses on the economically ever more acute Ecological Creditors and Debtors dilemma since it makes obvious the self-interest of countries to react to biocapacity constraints.



How do we know? By using Ecological Footprint accounting

The Ecological Footprint is the area of land and water it takes for a human population to generate the renewable resources they consume and degrade the waste it produces in a given technological context. In other words, it measures the "quantity of nature" that we use, and compares it with how much we have (biocapacity). This accounting supports decision makers when it comes to making difficult choices, managing conflicts of objectives and placing themselves in an optimal situation for the future. The accounts can be applied to the global, country, region, individual or product.

<u>Cropland:</u> Cropland is the most bioproductive of all the land-use types and consists of areas used to produce food and fiber for human consumption, feed for livestock, oil crops, and rubber. Due to lack of globally consistent data sets, current cropland Footprint calculations do not yet take into account the extent to which farming techniques or unsustainable agricultural practices may cause long-term degradation of soil. The cropland Footprint includes crop products allocated to livestock and aquaculture feed mixes, and those used for fibers and materials.

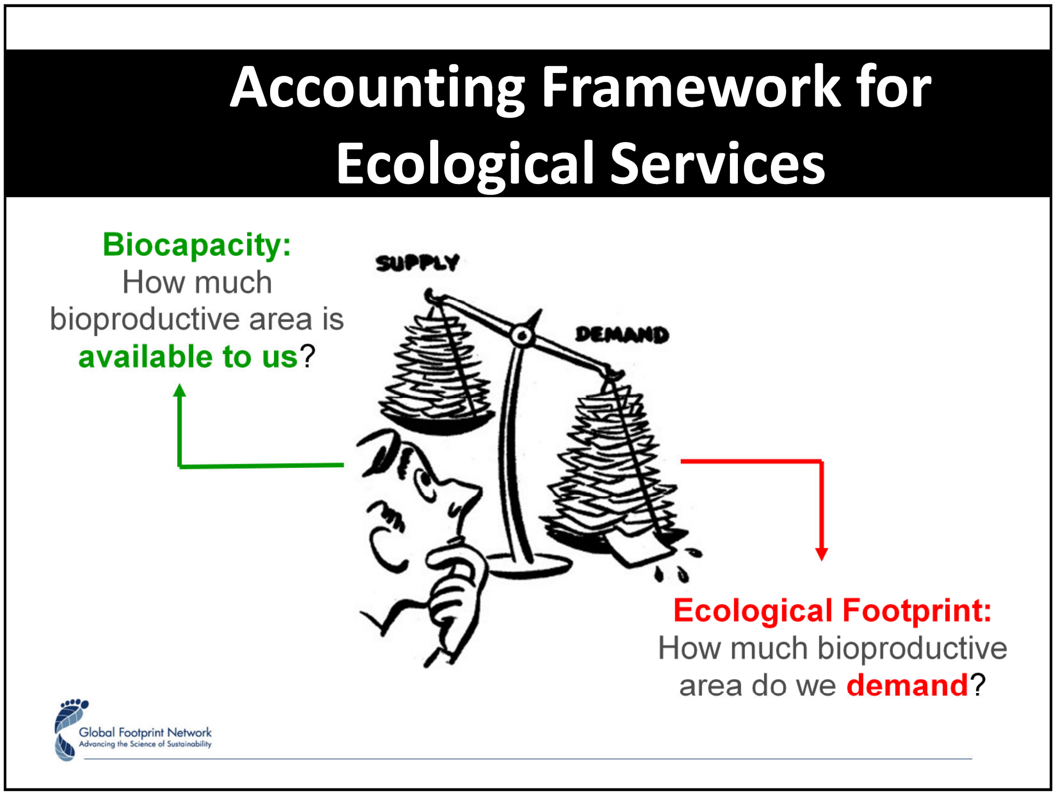
<u>Forest land:</u> The forest Footprint is calculated based on the amount of lumber, pulp, timber products, and fuel wood consumed by a country on a yearly basis.

<u>Grazing land:</u> Grazing land is used to raise livestock for meat, dairy, hide, and wool products. The grazing land Footprint is calculated by comparing the amount of livestock feed available in a country with the amount of feed required for all livestock in that year, with the remainder of feed demand assumed to come from grazing land.

<u>Carbon Footprint:</u> Carbon dioxide emissions from burning fossil fuels are currently the only waste product included in the National Footprint Accounts. The carbon Footprint includes embodied carbon in imported goods. The carbon Footprint component of the Ecological Footprint is calculated as the amount of forest land needed to absorb these carbon dioxide emissions. Currently, it is the largest portion of humanity's Footprint.

<u>Fishing grounds:</u> The fishing grounds Footprint is calculated based on estimates of the maximum sustainable catch for a variety of fish species. These sustainable catch estimates are converted into an equivalent mass of primary production based on the various species' trophic levels. This estimate of maximum harvestable primary production is then divided amongst the continental shelf areas of the world. Fish caught and used in aquaculture feed mixes are included.

<u>Built-up land:</u> The built-up land Footprint is calculated based on the area of land covered by human infrastructure — transportation, housing, industrial structures, and reservoirs for hydro-power. Built-up land may occupy what would previously have been cropland.



What is (physical) accounting for ecosystem services?

Ecosystem Services are the benefits that ecosystems generate, and humans depend on. According to the Millennium Ecosystems Assessment, the services can be divided into four categories:

1. **Provisioning** (food, water, energy, minerals, urban space, etc)
2. Regulating (**carbon sequestration**, water purification, pollination, etc)
3. Supporting (nutrient cycling, primary production, etc)
4. Cultural

Ultimately, all life competes for surface area. The Ecological Footprint is an accounting framework that tracks ecological services that compete for space. Current national accounts cover predominantly provisioning services, urban space provision, and carbon sequestration.

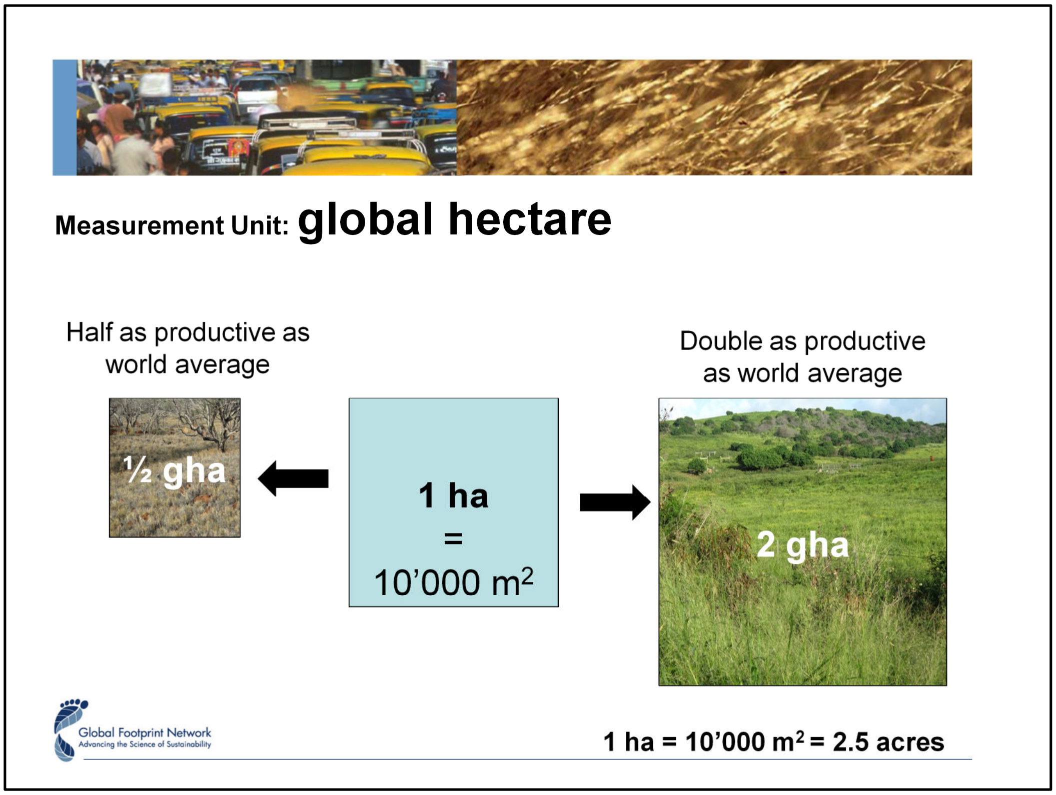
The Basic Equation behind the Footprint

Since *Yield = amount per year / area*

Area = amount per year / yield

To make results comparable, we translate hectares into global hectares

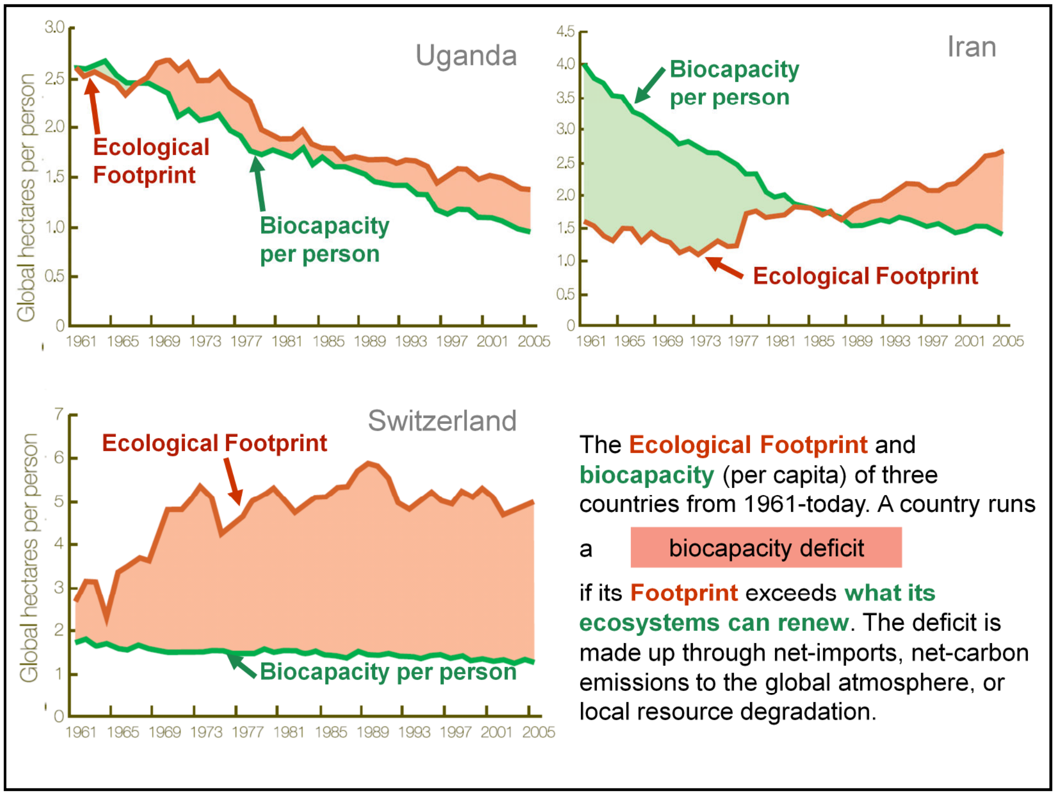
As with any account, there are two sides. This allows us to compare one side against the other. Financial accounting, for instance, compares income and expenditures. Footprint accounts compare **how much nature is demanded, to how much is available** (biocapacity).



A global hectare is a biologically productive hectare with world average productivity.

It is the Footprint and biocapacity unit of measurement, representing world average productivity of all the planet’s biologically productive land and sea area in a given year. Biologically productive areas include cropland, forest and fishing grounds, and do not include deserts, glaciers and the open ocean.

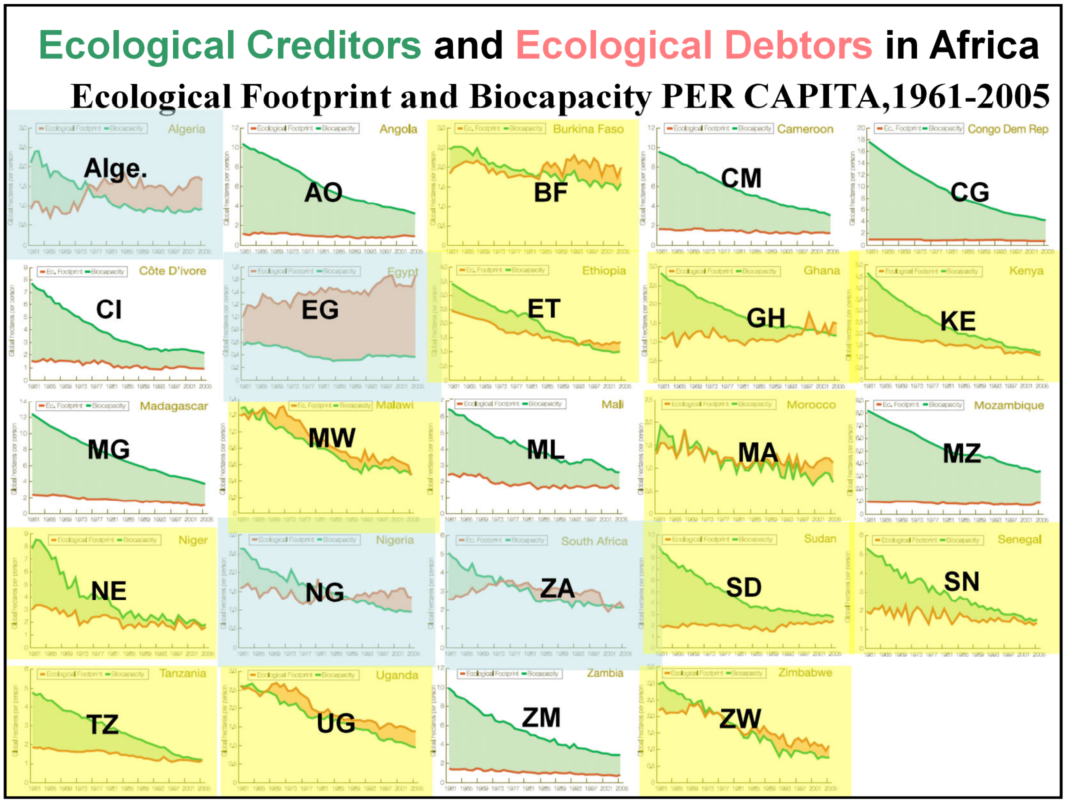
A productivity weighted area used to report both the biocapacity of the earth, and the demand on biocapacity (the Ecological Footprint). The global hectare is normalized to the area-weighted average productivity of biologically productive land and water in a given year. Because different land types have different productivity, a global hectare of, for example, cropland, would occupy a smaller physical area than the much less biologically productive pasture land, as more pasture would be needed to provide the same biocapacity as one hectare of cropland. Because world bioproductivity varies slightly from year to year, the value of a gha may change from year to year.



Examples of ecological debtors.

Switzerland makes up the difference between what it produces and what it consumes (i.e., its ecological deficit) through imports and demands on global commons. This means that Switzerland is reliant on biocapacity from other countries (including CO_2 sequestration).

Uganda was mostly overusing its own capacity (lack of financial assets does not allow Uganda to have significant net imports. Iran, thanks to its fossil fuel income, can import, and can burn its own fossil fuel – emitting CO_2 emissions to elsewhere.



24 African Countries compared: Here are 24 out of 55 African countries. All presented in PER CAPITA terms - on the same time scale, but the y-axis is different. Y-axis is adjusted to better show each country's trend.

Source Global Footprint Network, National Footprint Accounts edition 2008 (1961- 2005) [Note: newer data are now available].

All 24 African countries are rapidly loosing per-capita biocapacity.

Four (**blue-shaded**) countries have assets that allow them to have a net-import and to burn significant quantities of fossil fuel. Countries with economic assets such as fossil fuel are able to run an ecological deficit without necessarily depleting their own ecological assets (through net-imports and emission of CO2) (Algeria, Egypt, Nigeria, South Africa)

Others do not have that option. Twelve (**yellow-shaded**) countries' development is limited by their declining biocapacity (leading to SEVERE conflicts). Their ecological deficits leads to the liquidation of local ecological assets. Also, due to inability to get biocapacity from elsewhere, declining biocapacity per person is translating into declining per capita Footprints (Malawi, Burkina Faso, Uganda, Zimbabwe, Morocco)

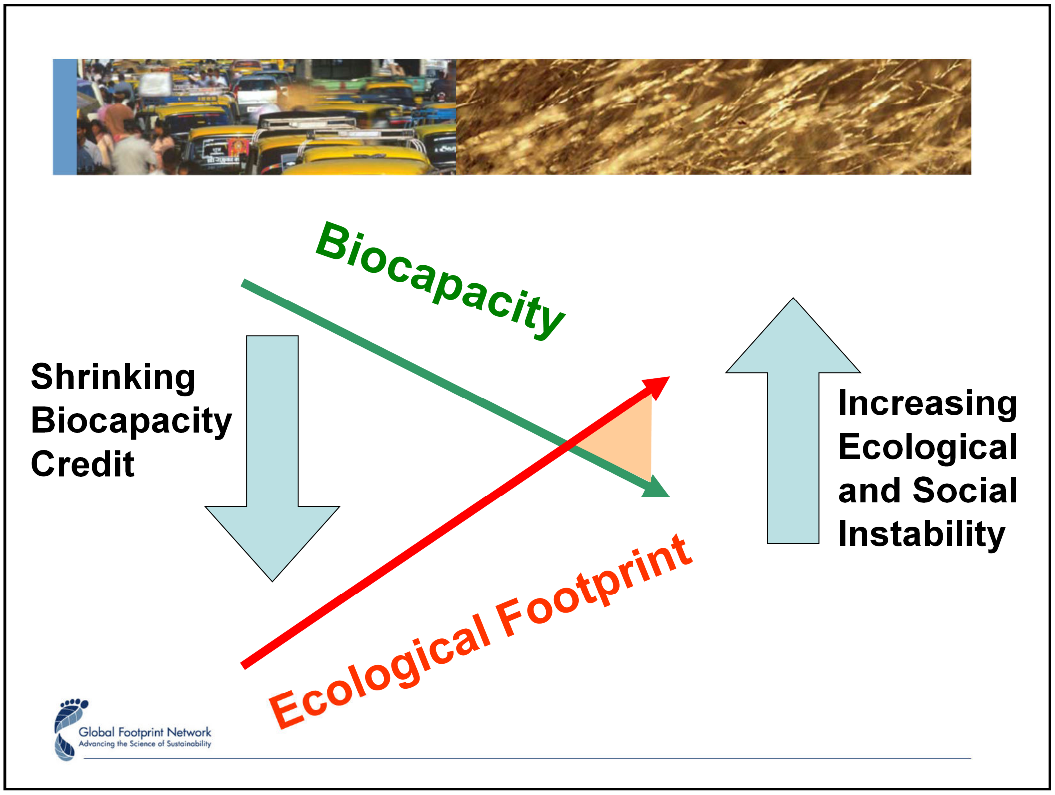
Others have reached ecological limits some time ago (Niger, Burkina Faso, Kenya)

Others are about to hit it (Tanzania, Senegal, Ghana [Ghana spikes might be due to inconsistencies in trade statistics])

Sudan is about to reach limits as a country, but there is also a regional distribution. Some of its areas (Darfur) have been in a much more tight situation than national average.

Congo has a lot of biocapacity, but its surrounding countries do not – hence there is in-migration pressure and conflict.

Note, drier countries have more irregular biocapacity – and climate change might become a particularly challenging threat for them.

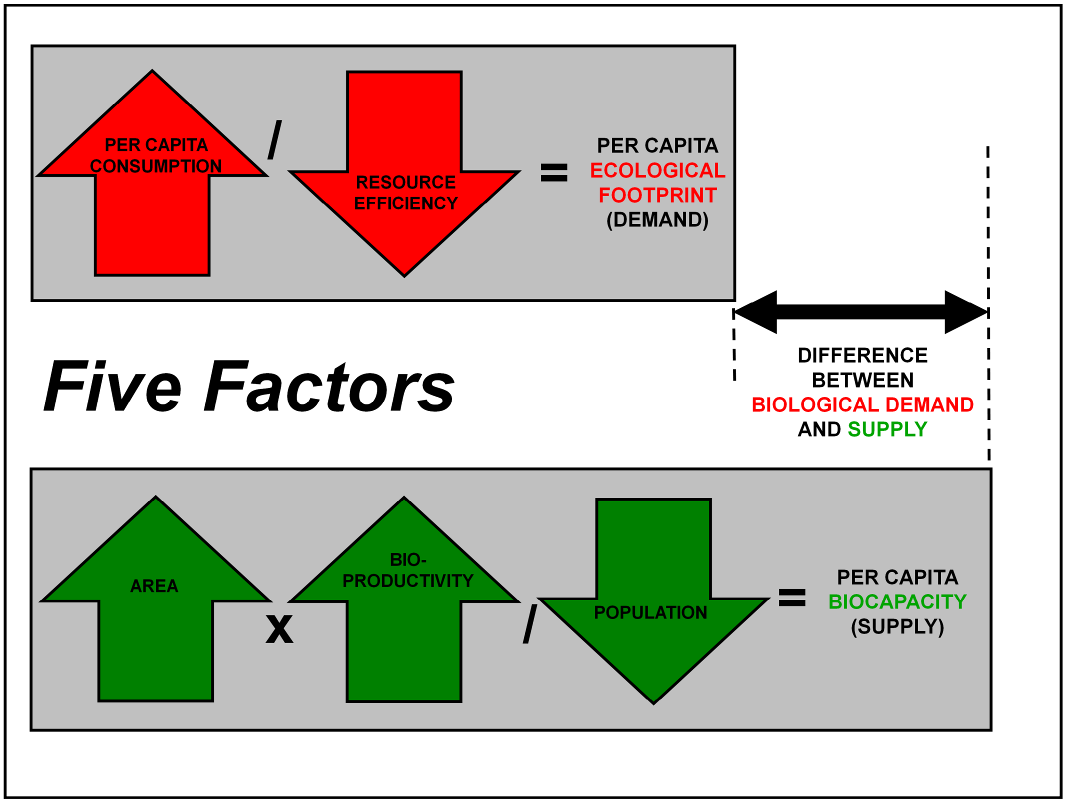


„Musical Chairs“

As the resource situation gets tighter in a country, the pressure on society mounts, particularly if a population does not have enough financial resources to compensate the lacking resources through trade.

We call this effect „musical chairs“. Because children get quite anxious when they play musical chairs, even though their livelihood does not depend on the chairs. Similarly, a population gets stressed as resource situations tighten.

For more background, consult literature on natural resource conflicts, or as an introduction, read Thomas Friedman's column about resource constraints and the Arab Spring.
http://www.nytimes.com/2012/04/08/opinion/sunday/friedman-the-other-arab-spring.html?_r=2 Particularly interesting are the 185 reader comments with surprisingly strong endorsement of Friedman's thesis.

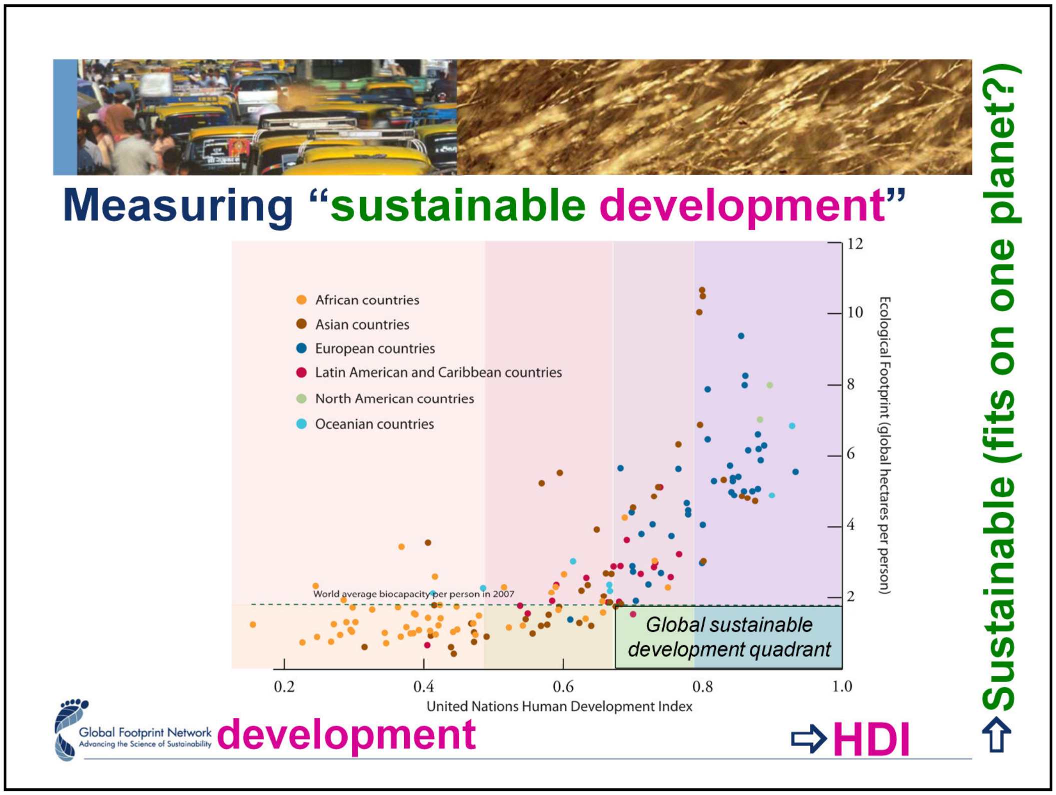


The Drivers

Five factors determine (mathematically) the difference between Footprint and Biocapacity.

One can use this formula for identifying which factors contribute how much to changing trends.

For instance, we can produce graphs that map the relative change of these factors over the last few years (for instance indexed against 100=1961).



Where are we today in terms of sustainability: are we living well within the means of nature?

Graph shows where countries are in terms of HDI—UN measure of quality of life (health, education, income)—and Footprint.

UN defines 4 stages of development from low (light pink - bottom quartile) to very high (purple/blue - top quartile). Higher human development is measured as a movement to the right along the x-axis.

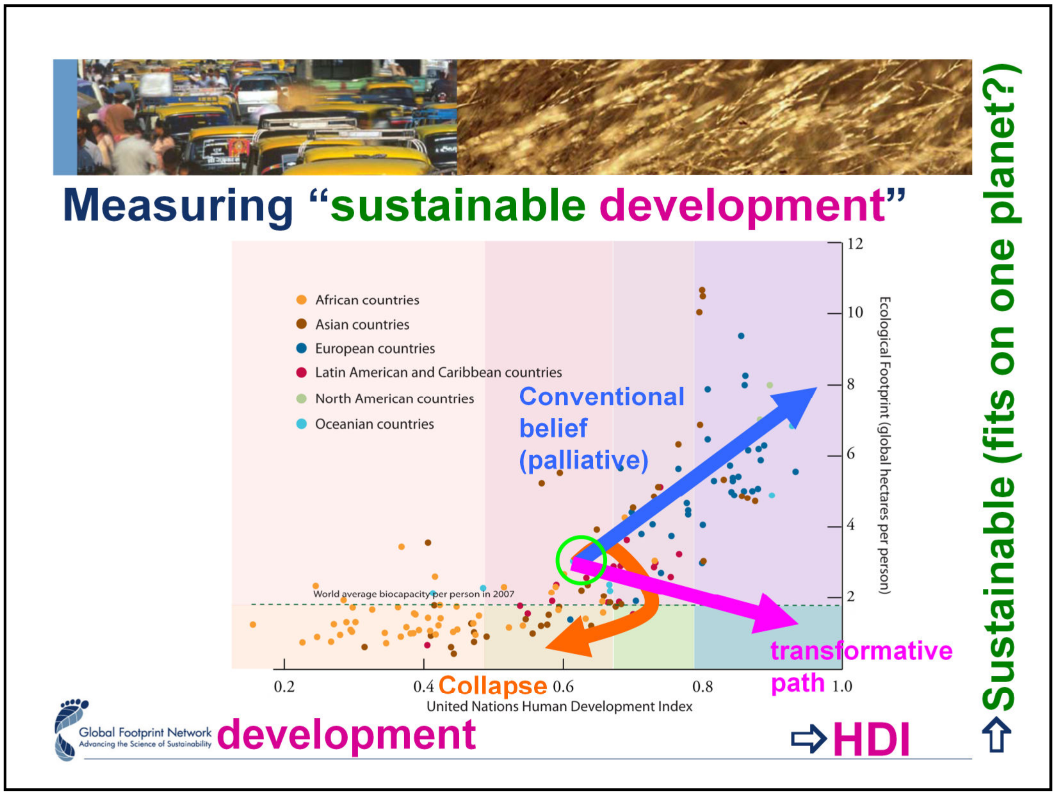
To make resource demand replicable worldwide, we must do on average on less than 1.8 productive hectares. This is the amount available per person worldwide. Higher resource demand (per person) is measured as an upward movement along the y-axis.

Challenge of global sustainability is, on average, to be in the *sustainability quadrant (blue bottom right corner)*, with high level of human development and Ecological Footprint per person that is within the global average biocapacity per person.

Today, only a few countries come close to meeting both criteria (Peru is in the box).

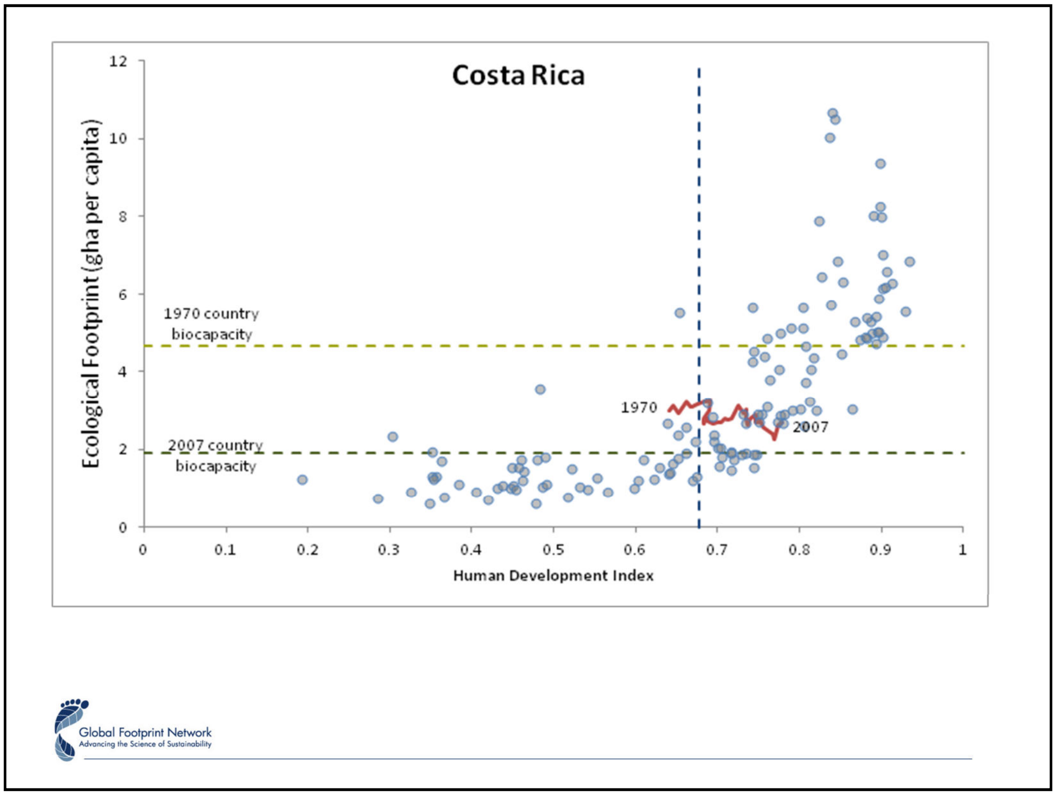
Note 1: the HDI and Footprint results are always a snapshot in time, and much of the underlying data on production and consumption is self-reported by countries to the UN (e.g., FAO).

Note 2: for the last two years, UNDP's Human Development Report includes the Ecological Footprint numbers in its tables.



Under current development strategies, populations move to the right along the HDI axis and, as an unintended consequence, upwards along the Footprint axis. Conventional Development increases HDI without looking at resource stability. Result can be collapse (as in example of Kenya or Zimbabwe which show such an "inverted C" trajectory). Such conventional development we consider to be PALLIATIVE.

Or we pursue sustainable development – we make development last – by increasing human wellbeing while reducing resource risks for the population. We consider such development to be TRANSFORMATIVE.

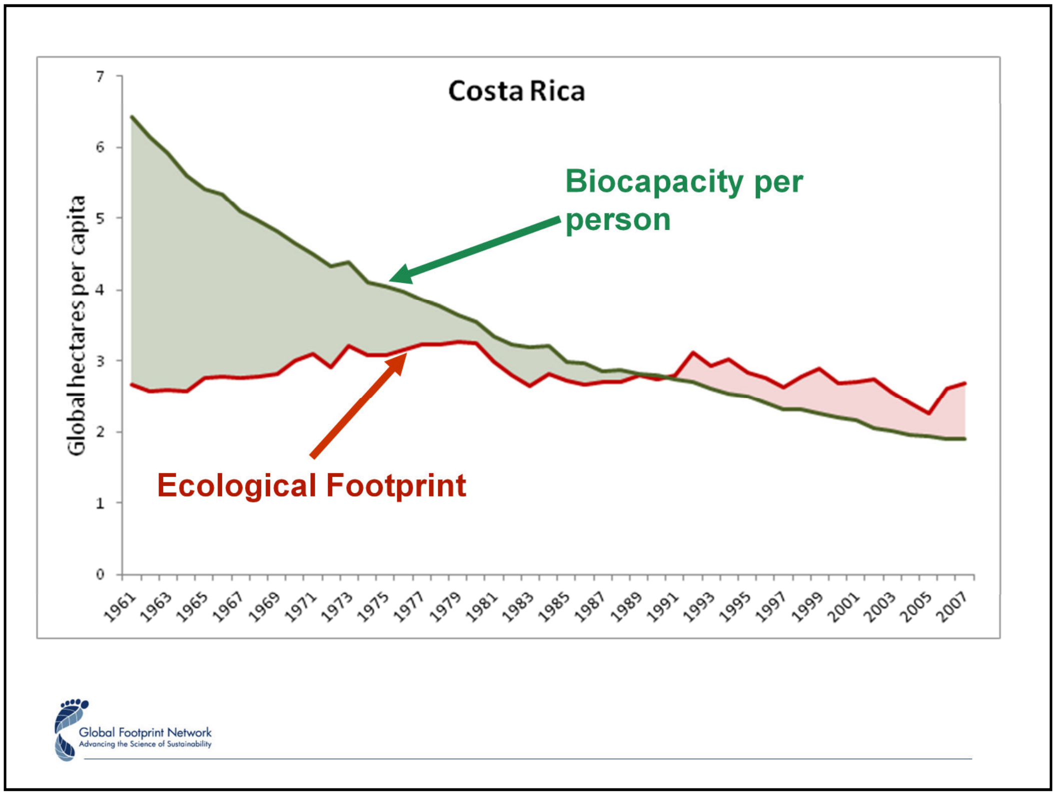


COUNTRY EXAMPLE : COSTA RICA

In 1970 Costa Rica had a lower HDI, but its Ecological Footprint per capita was within its available biocapacity. Costa Rica has increased its level of human development; since 1970 it has moved to the right along the HDI x-axis.

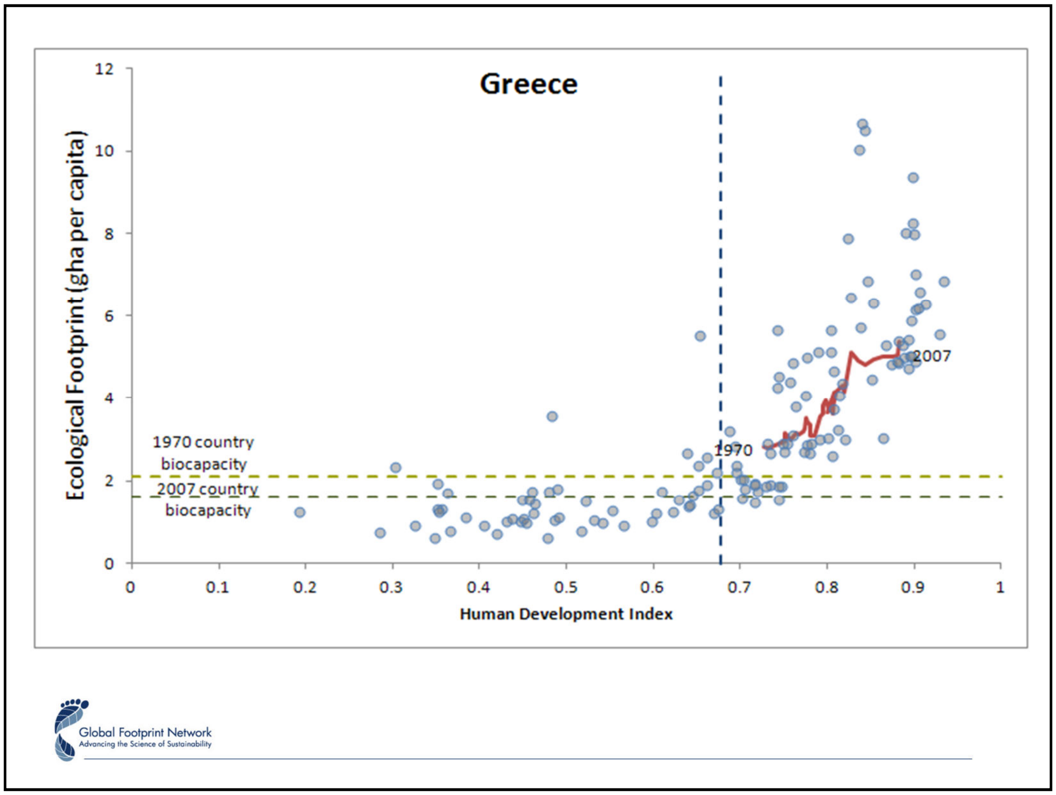
The two vertical dashed lines show Costa Rica's biocapacity per person in 1970 (top) and 2007 (bottom). So while Costa Rica has increased its HDI, the amount of Costa Rica's biocapacity available per person has dropped.

So even though the per person Ecological Footprint has stayed relatively constant (has not increased or decreased), in 2007 it was above Costa Rica's biocapacity – Costa Rica is consuming resources faster than they can be regenerated in Costa Rica.



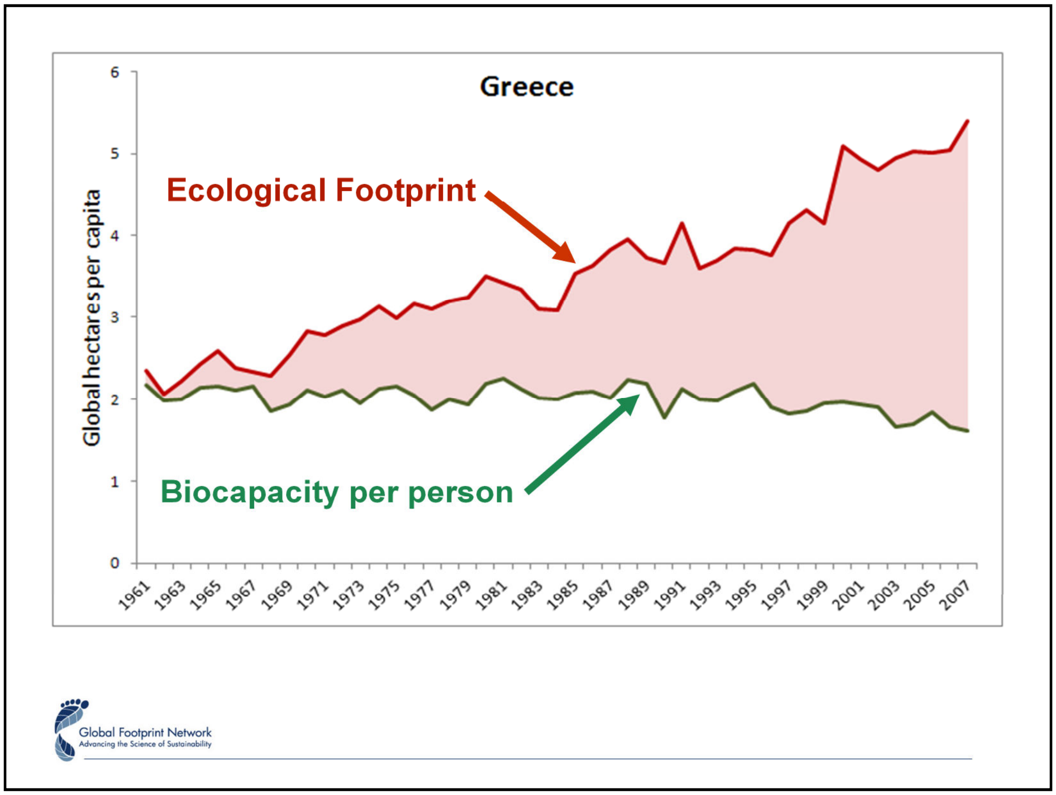
TIME TREND FOR COSTA RICA – PER CAPITA FOOTPRINT AND BIOCAPACITY

As the HDI of Costa Rica has increased and its per person Ecological Footprint has stayed relatively constant (not increased), the amount of domestic biocapacity per person has been shrinking and Costa Rica has been running a biocapacity deficit since the early 1990s.



COUNTRY EXAMPLE : GREECE

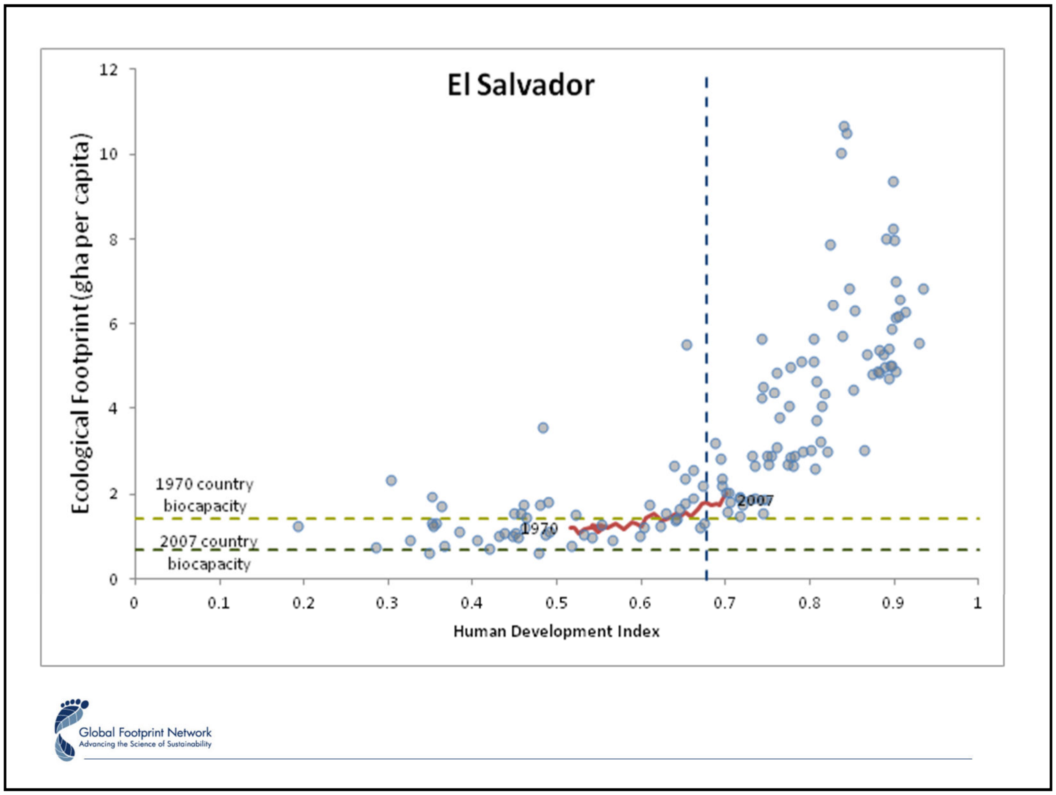
Greece has followed the conventional path of Human Development that we observe at a global level – the HDI and Ecological Footprint increase. Improvement in Greece's HDI is accompanied by significant increases in the per capita Ecological Footprint between 1970 and 2007.



TIME TREND FOR GREECE – PER CAPITA FOOTPRINT AND BIOCAPACITY

… and it has been running a rapidly increasing biocapacity deficit. This ecological overspending may not manifest as ecological depletion, but as additional financial strain as Greek needs to import more and more resources that are more and more costly.

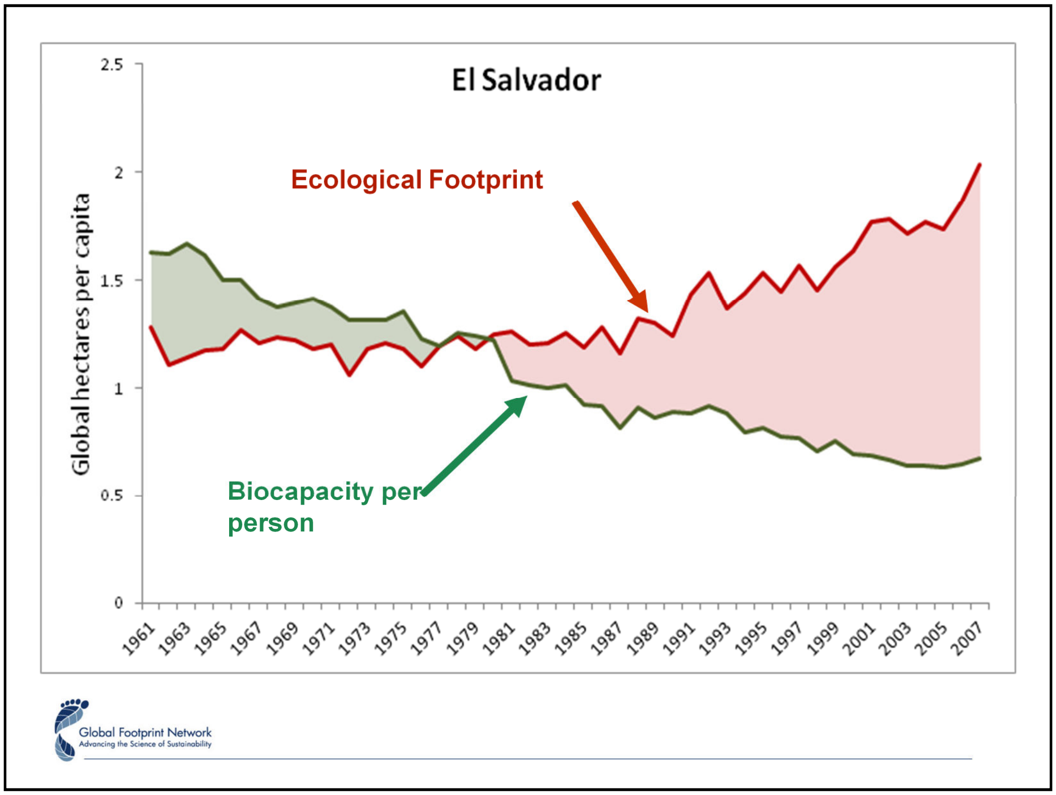
There are indications that this increased resource cost for Greece destabilized the Greek economy in the last years.



COUNTRY EXAMPLE : EL SALVADOR

El Salvador has also increased HDI between 1970 and 2007, while at the same time its per capita Ecological Footprint has increased only slightly (compared to Greece).

But their already tiny biocapacity per person shrank even more – now running a significant ecological deficit.



TIME TREND FOR EL SALVADOR – PER CAPITA FOOTPRINT AND BIOCAPACITY

However, El Salvador's biocapacity is also decreasing like in the case of Costa Rica. El Salvador's growing biocapacity deficit is a result of increasing Ecological Footprint and decreasing biocapacity.

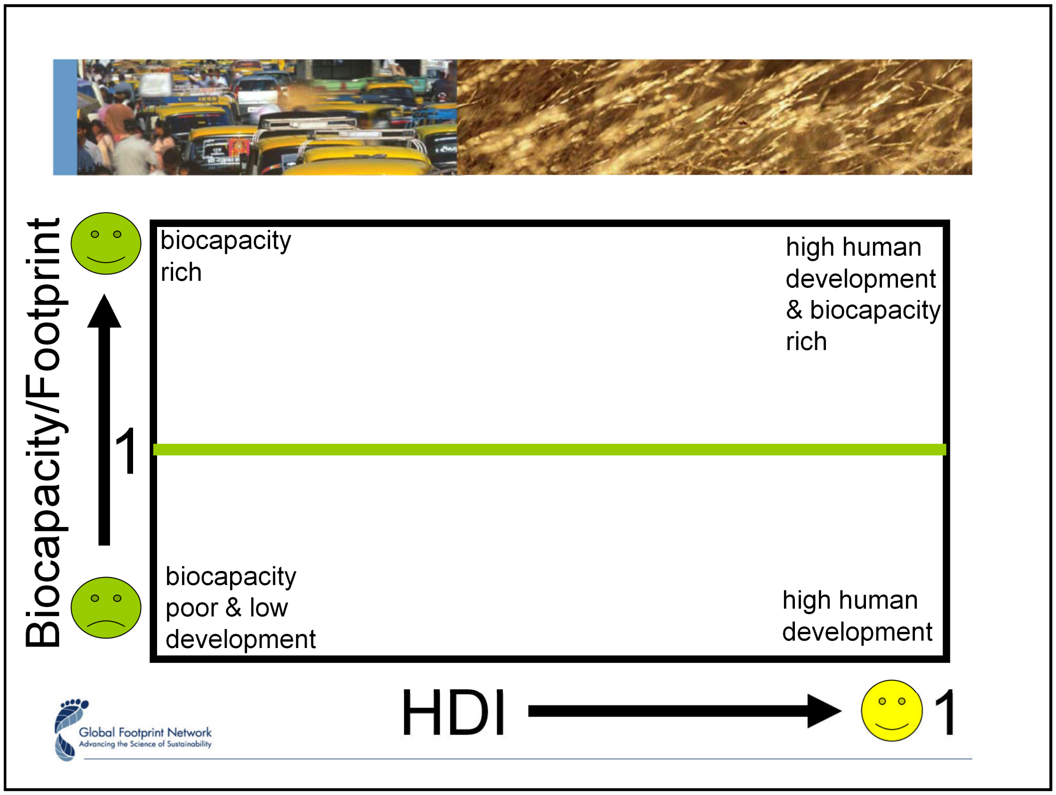
Why "Sustainable Development Return on Investment" (SDROI)?

How much transformative poverty alleviation are we buying per dollar investment? How much sustainable development do we buy with a given project? What is a project's sustainable development benefits for the host nation? This is what SDROI answers.

What are potential benefits of an SDROI tool as it measures the sustainable development performance of projects and programmes? And to whom?

- As projects are designed?
- As they are "sold" (fundraising)?
- As their impact is evaluated ("post-mortem")?
- As funders try to understand the impact of their portfolio?

SDROI becomes a concentrated one-number summary of a lot of complex information. It captures human development advances, and the need to make sure it is transformative (rather than palliative). Of course, the summary can be peeled apart to look at all the components and contributions to the overall score. And the score is not built on an arbitrary index – it helps to dismantle the drivers shaping sustainable development. How can it become a useful communication tools for informing decision-makers associated with project, whether funders, managers, clients?



Initial Framework – HDI- Footprint space:

It is possible to apply these macro-level indices at a smaller micro-level. For instance, a village, or a community. For each population, we can measure the factors that make up human development, biocapacity and the Footprint (i.e. longevity and fertility, education, income, population, productive area, productivity, consumption, and efficiency). As a result, the population's current sustainable development position can be tracked by mapping their HDI, Ecological Footprint, and biocapacity in the HDI-Footprint framework.

Data exist at the national level to track countries. Also at the project level, all these data points can be assessed. The basic information is simple enough for villages to track (for details, see page 30)

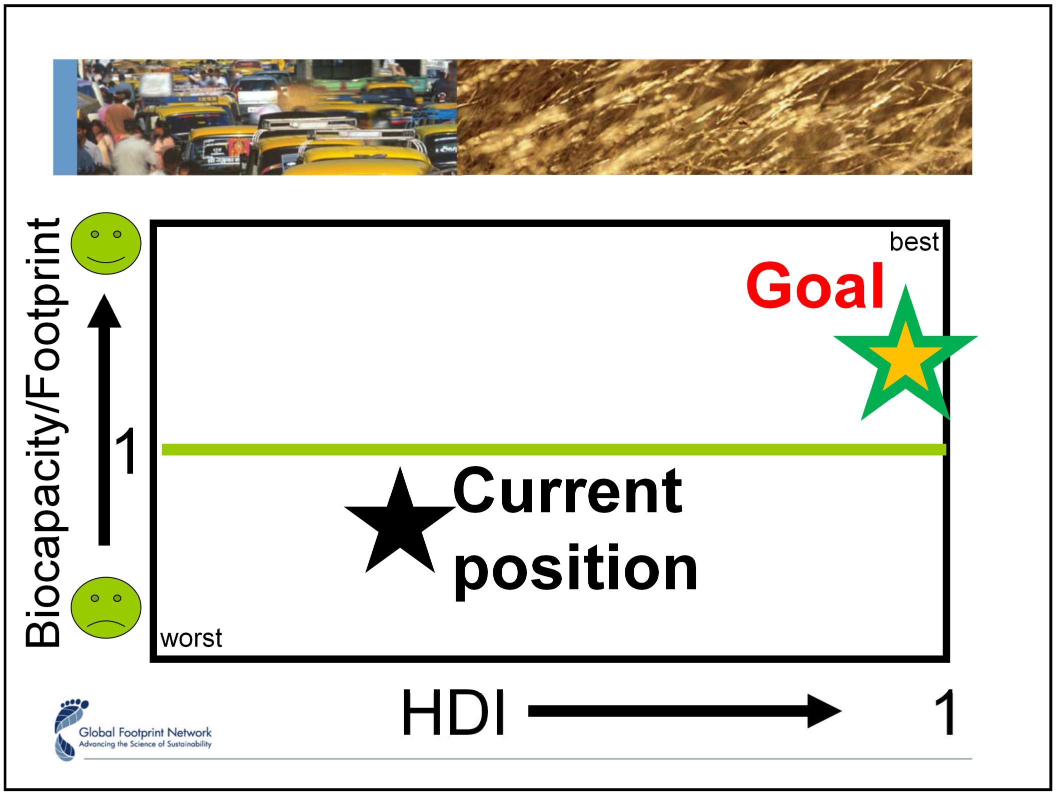
Note: here, we flip the diagram around, so moving up and to the right means moving into a desirable situation. Up is resource or biocapacity rich, right is high human development outcomes.

When the ratio of Biocapacity/Footprint = 1, human consumption of biological resources is equal to the amount of resources that can be regenerated. There is no reserve, all is used for oneself.

Each project or target population needs to define its sustainable development goal. This means achievements in both human development and "optimal resource consumption" (e.g. choosing to be biocapacity rich, which should be an advantage in a resource constrained world. This means biocapacity to Ecological Footprint ratio of more than 1).

If the ratio of Biocapacity/Footprint , for example, is 10, the country or population is more like a rich farm. In this case, the "farming family", the country or the population consumes much less (i.e., 10 times less) than the "farm" can produce. In other words, the population has more ecological assets than it takes to feed them. They are biocapacity-rich.

If the Biocapacity/Footprint ratio is, for instance, 1/3, then the country or population runs a biocapacity deficit. Population is using in net terms 3 times more than what the available biocapacity can provide. This means that they are biocapacity-poor.



Identifying the current position – measurable for countries, cities, communities, individuals – and setting goals

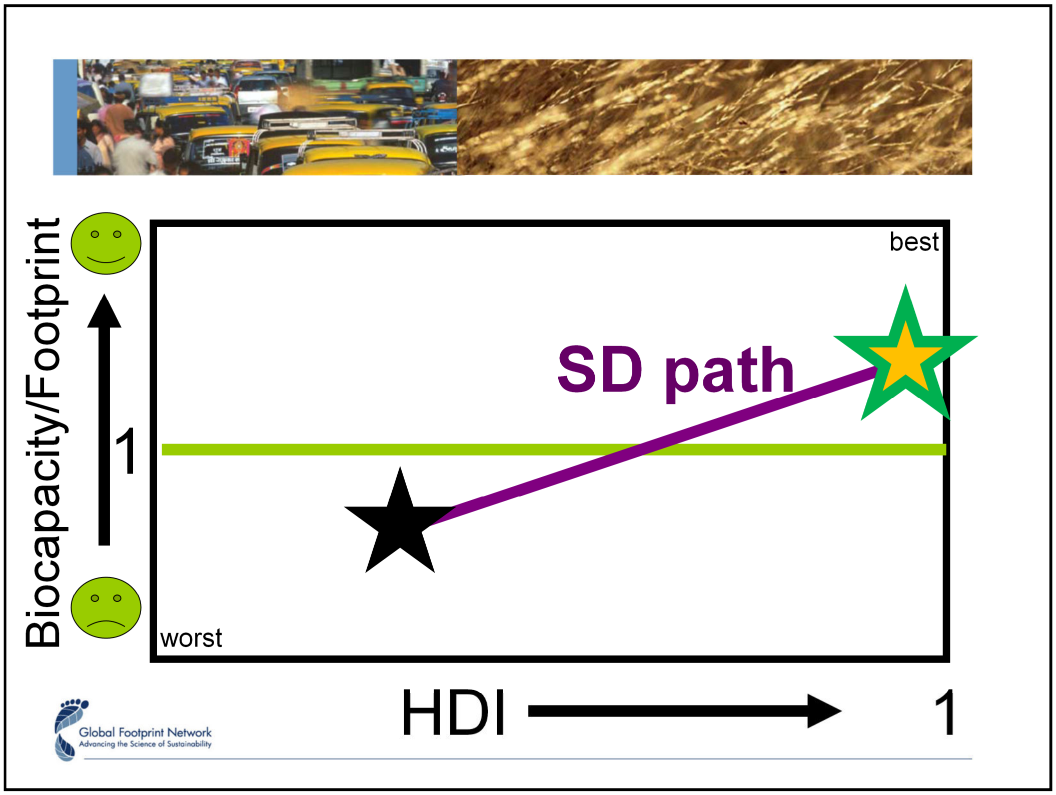
Goal within a generation or two: **a)** how high HDI? **b)** How biocapacity or resource rich?

What is our country's (or target population's) optimal resource consumption? How big of an ecological deficit is in their best interest? The population needs to answer for themselves, driven by their own self-interest.

Determining "optimal resource consumption": What level of resource consumption is in your country's best interest as the world is moving into an ecologically-constrained future?

You want to offer all people the opportunity to live flourishing lives. But continuously increasing your resource demand may mean increasing your ecological deficit. Running such an ecological deficit in a resource-constrained world is becoming an increasing risk factor. Just as economists now ponder the optimal inflation or unemployment rate, each region may need to consider its ideal level of resource consumption – compared to its own ecological assets.

NOTE: If your income is below world average, more likely the world will buy more from you than you will be able to buy from the world (with the exception of emitting fossil-fuel based CO_2 which still has no market cost).



The Sustainable Development (or transformative poverty alleviation) Path

If you accept ecological constraints (or the reality that the planet is not expanding), logically, every population, region or and country, has to determine its own optimal level of resource consumption. A consumption rate that is too low can lead to inadequate food, shelter and health services. Conversely, a consumption rate that is too high can put a population at risk, since domestic ecological deficits in a world with significant ecological overshoot globally will become an increasing liability to economies.

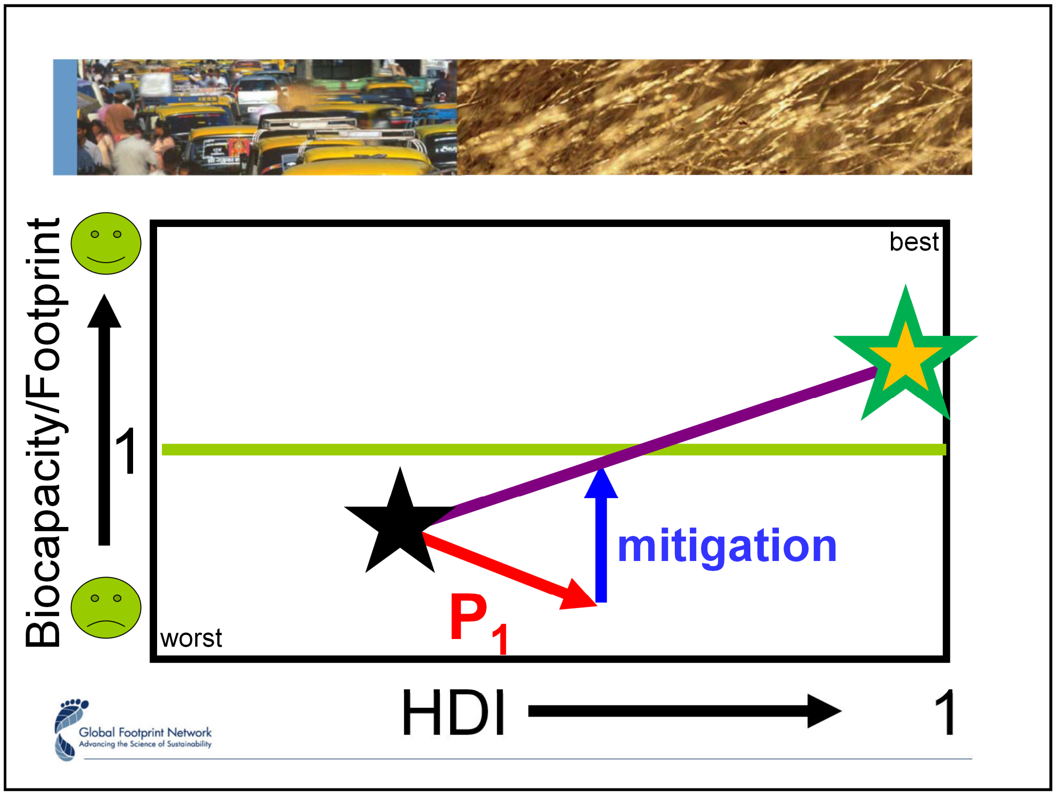
Optimal resource consumption for a region or country depends on three factors:

1. the amount of biocapacity in their country,
2. the amount of biocapacity in the world as a whole, and
3. the country's purchasing power compared to world average.

If the country's purchasing power is below the worldwide average, then it is unlikely the region will be able to maintain a positive biocapacity trade balance. Countries with low purchasing power will not be able to access biocapacity from elsewhere (For instance, they may up ending giving up more biocapacity through raw materials export, than they get back through import of manufactured goods). Rather, they may in fact end up sacrificing biocapacity to countries with purchasing power.

<u>Trajectory</u>: the ultimate goal is to maximize human well-being with optimum resource consumption. The path is given between where they are now, and where they say their optimum goal is.

How much budget does the population have over the next one or two generations? Therefore, how much HDI movement per dollar investment is needed to reach the goal?



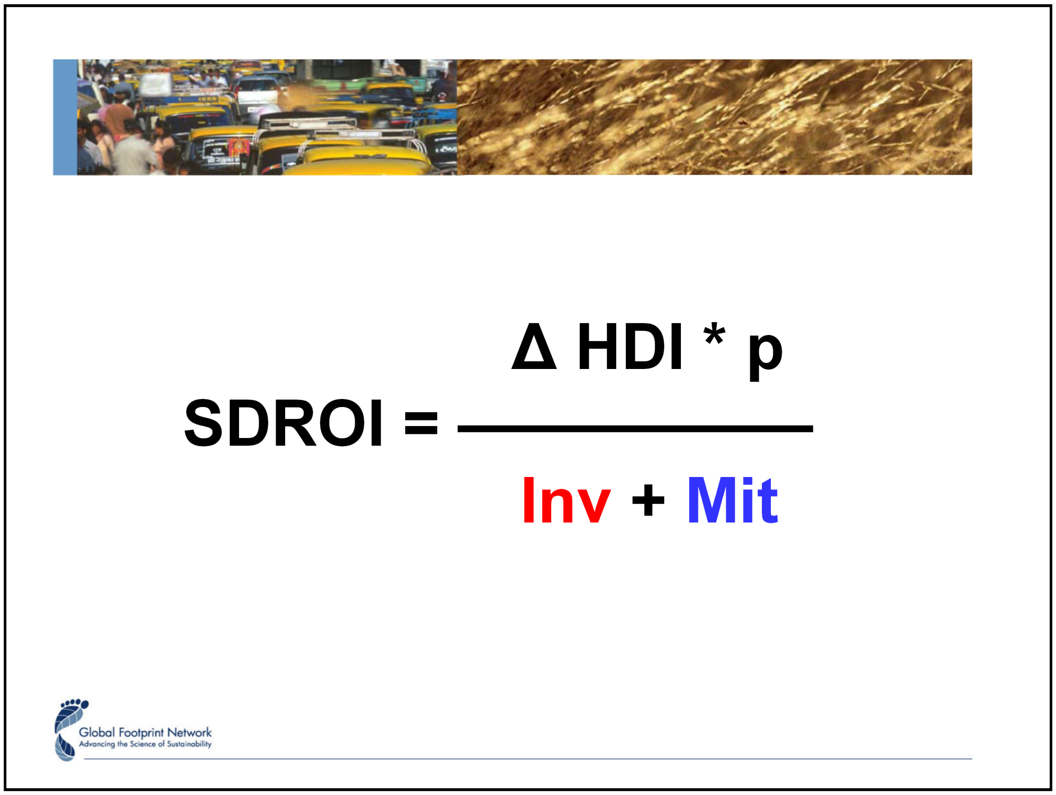
How is the project changing the population's sustainable development position?

How was the well-being of the population affected by the project? How was biocapacity affected by the project? How was the Ecological Footprint affected by the project?

If the project promotes increasing Ecological Footprint (or lower biocapacity) with increasing HDI, mitigation costs are also required to neutralize the unintended consequences of project implementation. Without mitigation, the population is exposed to the fatal risk o not having the resources to support their human development in the future (it would be palliative development).

Mitigation costs: the costs of returning the population back to a point on the trajectory. Examples of mitigation costs include CO_2 damage costs, investment in renewable energies, CO_2 savings through energy efficiency, waste treatment, lower birth rate through educating women, promoting productivity…

If the outcome of a project is higher HDI and a ratio of Ecological Footprint to biocapacity that is above the trajectory, then an added benefit is achieved through avoided mitigation costs. (Mitigation costs would be negative, and **blue arrow** would be going down. In other words, this mitigation benefit would reduce the investment costs, thereby increasing the project's SDROI).



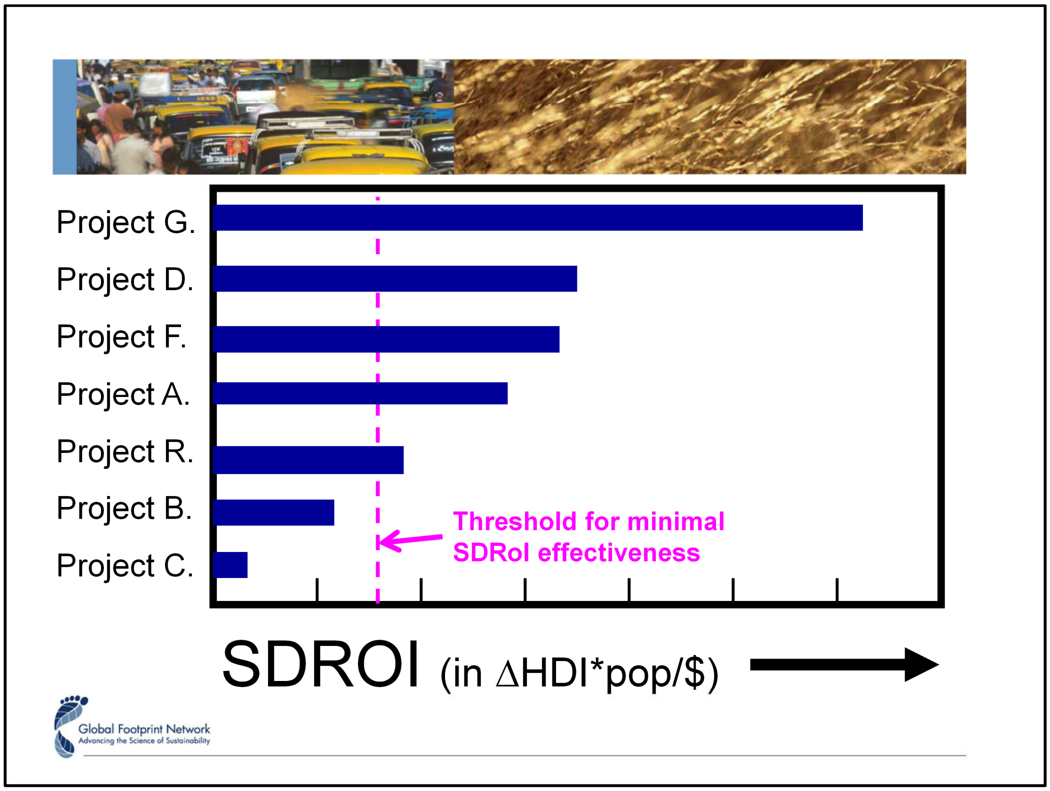
The SDROI Formula

How is progress demonstrated to donors/funders of sustainable development initiatives? How effectively and efficiently does a project lead toward sustainable development? How many people are affected by a project and how exactly does mitigation work?

A general cost-benefit analysis can be applied to the conceptual Ecological Footprint, biocapacity, and HDI framework. The benefit of a project can be measured as an aggregate increase in human development (*ΔHDI*) in the target population (*p*). The costs of the project are the investment costs (*Inv*) plus the mitigation costs (***Mit***).

This equation captures both of the goals of sustainable development: promoting human well-being is in the numerator as the change in HDI multiplied by the target population, and optimal resource consumption is reflected in the **Mitigation cost** in the denominator.

Now we can rank projects against each other.

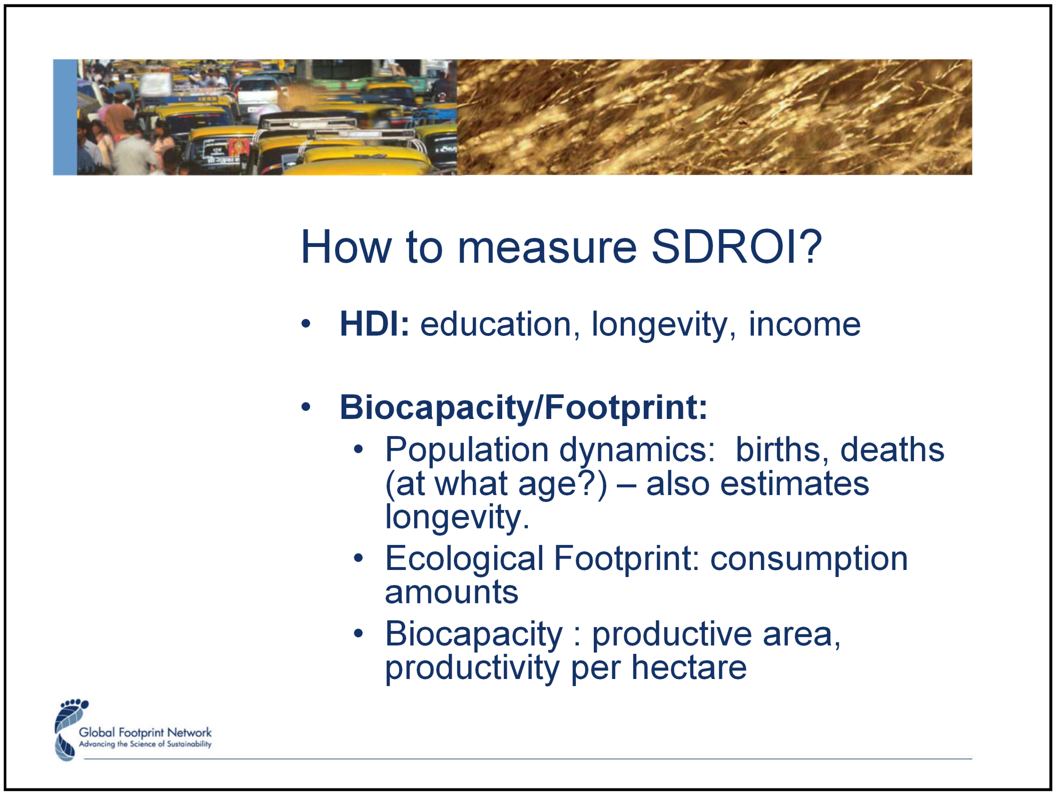


Ranking SDROI of projects

How much sustainable development do various projects produce per dollar investment? (SDROI)

Once the SDROI analyses are performed, we can compare projects against each other. How much return on investment does each produce? The results of the analysis expressed in how much change in HDI is produced for how many people, per dollar project cost. Project costs include both the investments as well as mitigation costs. (Mitigation costs can be negative).

This comparison allows us to rank the SDROI effectiveness of various projects. We can also compare this effectiveness against minimal thresholds defined by absolute distance to goal divided by total available budget. The rationale behind this threshold is pretty straightforward. If there is a given budget to achieve the goal, there is only x amount of dollars per path unit available. Every project that produces less outcome per dollar is therefore undermining the possibility that the population will reach its goal.



Issues to consider

•Attribution problem

•Time frame

•Mitigation costs

•Sequencing interventions vs. control group

•Only measures outcomes (not strategy or process). Did lasting changes in human development and resource exposure occur?

•Not a project management tool, just an impact measure

•Are the project goals being achieved within a reasonable amount of time?

EXAMPLES

•IDE-India – what is the impact for farmers that start using a treadle pump? How much lasting well-being is produced per dollar investment cost (typically 20 USD per family).

•GramVikas – what is the impact for villages getting sanitation? How much lasting well-being (including income opportunities, reduced fertility, higher longevity, and social capital to solve other problems) is being produced per dollar investment cost?

Benefits?

•Offers measurement of macro impact of projects. What is their contribution to the population's overall (lasting) development?

•Distinguishes palliative from transformative development?

•Establishes minimum performance standards

•Simplifies many aspects of sustainable development into one performance number, without using an index. It is based on a clear research question. (How much lasting human development is produced per dollar cost?)

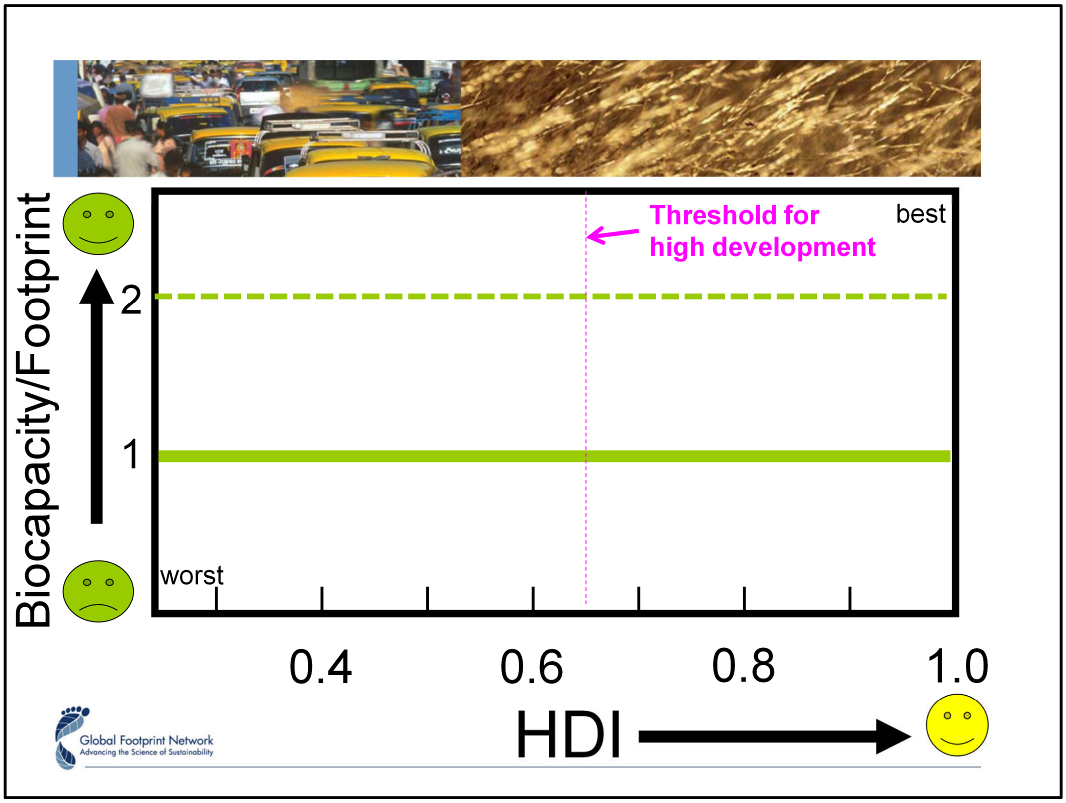
•Compares projects across arenas and geographies

But?

Will there be unintended consequences? Yes, but this captures far more of outcomes than "income" or "GDP" or "health" alone. Does it capture 80% of sustainable development while GDP may capture 20%? Is it a necessary (but not sufficient) condition?

Can it really be measured with sufficient precision? How much precision does it need?

What if nobody else uses it? Is it valuable for the pioneers?



Exercise sheet – How is your Project performing?

Where is your population now on the HDI- Footprint space? What is the longer term goal for your population? By when?

Consider for the goal both HDI and resource deficit. If your population is likely to have a higher income than world average, they may be able to afford a resource deficit. If not, it is more likely that the world will buy biocapacity from them (in net terms) than they are able to buy from the world. Hence you may want to consider the advantage of building ecological assets and having a Biocapacity to Footprint ratio larger than one.

Explain in qualitative terms your project. How does it affect:

HDI:

- education
- longevity
- income

Footprint to Biocapacity ratio:

- Population dynamics: births, deaths (at what age?) – also estimates longevity.
- Ecological Footprint: consumption amounts
- Biocapacity : productive area, productivity per hectare

Possible need for mitigation: How much would an additional project cost to get the population back on track? Or if a project overperforms resource-wise, how much is this worth, and can be deducted from investment costs?

How is your project more effective in producing SDROI than the industry standard? How could your project be strengthened to produce more SDROI?