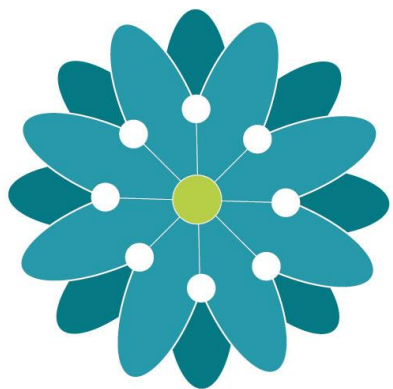


Environmental Markets - Investing in Nature

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- About 40% of global GDP intrinsically relies on natural capital - yet we don't value it and we treat the environment as a charitable exercise

TEEB

- *“The global economic benefit of biological diversity, the costs of the loss of biodiversity and the failure to take protective measures versus the costs of effective conservation.”*
- *Answer : \$14 trillion; 7% global GDP by 2050*



OECD Report 2012 - Outlook to 2050

	Per capita GDP NOT accounting for loss of natural capital	Per capita GDP accounting for loss of natural capital
Brazil	34%	3%
India	120%	9%
UK?	2% ?	-20%?



We need a paradigm shift

1. Intrinsic value alone is not enough
2. Make nature economically visible - proper accounting of the value of our natural environment in decisions and policies across all sectors
3. Need for a new economy to enable investment into biodiversity and ecosystem services - understanding massive supply chain risk

Environmental markets

- Internationally there is mounting interest in environmental markets from credit buyers, regulators, investors, environmental community
- Emerging recognition of natural resource stewardship and restoration as a dynamic area for investment
- Transforming biodiversity from a risk and liability problem into viable profit-generating business opportunity
- Environmental Finance; Ecosystem Marketplace

Where...?

- CAP Reform
- Payments for Ecosystem Services
- Biodiversity Offsetting
- Environmental Bonds
- Natural Capital Accounting (Natural Capital Committee)
 - corporate reporting - annual accounts
 - ONS and NAO interest developing
 - see recent GLOBE report

Ecosystem Markets Taskforce - key recommendations

- Biodiversity offsetting - mandatory - securing net gain for nature through planning and development
- Bio-energy and anaerobic digestion on farms
- Sustainable local woodfuel
- Nature-based certification and labelling
- Water-cycle catchment management - integrating nature into water, waste water and flood management

Biodiversity Offsetting

“..conservation activities designed to deliver biodiversity benefits in compensation for losses, in a measurable way”

Voluntary - current trials

- Slow take-up - lack of urgency
- Inconsistency between LPAs
- Lack of a market

Mandatory - LPAs mandated to use the metrics

- Rapid market (scale-up) created - supply of receptor sites via landowners, farmers, conservation bodies, providing choice
- Consistency across Local Planning Authorities
- No extra cost - residual land value
- Market = c.£1.2bn p.a
- Will stimulate SME's and will grow the rural economy
- Metrics, trading system, delivery system - all in place

Benefits to Developers

- Level playing field, gives certainty and clarity
- Speeds up planning process reducing costs
- Increased net developable areas
- Mandatory system drives a market for offset site provision = choice = cost-effective
- No long-term commitments or management costs - liabilities discharged at point of purchase of offset credits
- Enables biodiversity gain - biodiversity changed from a liability problem to a benefit of development - a game changer
- Improved financial planning

What is needed to grow emerging markets ?

- Good regulatory framework rather than voluntary approach
- Standardised metrics
- Accreditation of suppliers of offset and ecocredits
- Clearly defined asset classes
- Cooperation between science, finance and on-the-ground delivery
- Verification, registry, tracking of credits and enforcement
- Environmentally experienced brokerage system - trading platform (Environment Bank)

Environment Bank - what we are doing

- Operating brokerage model developed
- Essex & Warwickshire pilots plus national coverage
- Building receptor site capacity - Environmental Markets Exchange
- Applying metrics to impact and receptor sites
- Legal and fiscal assurances
- Asset classes - biodiversity, woodland and peatland carbon, water
- Long-term delivery contracts - Conservation Bank Agreement, Conservation Offset Purchase Agreement; monitoring, compliance
- First offset credit sales undertaken - housing schemes

Environmental Markets Exchange - National Registry and Trading Platform

- National platform for registering receptor sites and trading credits
- International tie-up with Mission Markets
- Launched February 2012
- First phase of receptor sites ready to go
- Partner involvement
- Become a member -
www.environmentbank.mmearth.com



Environmental Markets Exchange

Mechanism

Project Type

Unit Type

Continent

Country

State

City

Search



Offering Name	Regional Focus	Mechanism	Project Type	Unit Type	ARCs	Bids / Offers	
Primrose Lodge	Ribble Valley, United Kingdom	Environment Bank Conservation Credit	Other Broadleaved, Mixed and Yew Woodland	Conservation Credit	Environment Bank/BBOP	0 / 4	view details trading board
Banner Meadow Reserve	West Midlands, United Kingdom	Environment Bank Conservation Credit	Ponds	Conservation Credit	Environment Bank/BBOP	0 / 0	view details trading board
Cromwell's Crossing	Worcestershire, United Kingdom	Environment Bank Conservation Credit	Other Neutral Grassland	Conservation Credit	Environment Bank/BBOP	0 / 0	view details trading board
Chapel Hill Wood & Horsington Wood	Lincolnshire, United Kingdom	Environment Bank Conservation Credit	Traditional Orchards	Conservation Credit	Environment Bank/BBOP	0 / 0	view details trading board
Fingringhoe extension - EBOP	Essex, United Kingdom	Environment Bank Conservation Credit	Other Standing Open Waters and Canals	Conservation Credit	Environment Bank/BBOP	0 / 0	view details trading board
Nevendon Washland - EBOP	Essex, United Kingdom	Environment Bank Conservation Credit	Ponds	Conservation Credit	Environment Bank/BBOP	0 / 5	view details trading board
The Great Meade	Oxfordshire, United Kingdom	Environment Bank Conservation Credit	Other Neutral Grassland	Conservation Credit	Environment Bank/BBOP	0 / 5	view details trading board
Elf Kirk	Northumberland, United Kingdom	Environment Bank Conservation Credit	Other Acid Grassland	Conservation Credit	Environment Bank/BBOP	0 / 3	view details trading board
Shabbington Woods & Meadows	Buckinghamshire, United Kingdom	Environment Bank Conservation Credit	Lowland Meadows	Conservation Credit	Environment Bank/BBOP	0 / 3	view details trading board



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Primrose Lodge


[View Offering Details](#)

Trading Board

Mechanism	Project Type	Unit Type	# Units	Regional Focus
Environment Bank Conservation Credit	Other Broadleaved, Mixed and Yew Woodland	Conservation Credit	11	Ribble Valley, United Kingdom

Offering Mission

Ribble Valley Borough Council will identify, develop and promote the social, economic, cultural and physical well-being of the community in Ribble Valley in the most efficient, effective and economic manner consistent with the rural nature of the area.

Offering Description

Primrose Lodge, found in the ancient market town of Clitheroe, is a designated County Biological Heritage site with potential to become a local nature reserve. The manmade reservoir was built for manufacturing processes and generation of power for Primrose works but as water, electricity and gas took over the need for the adjacent mills own source water supply, the lodge became redundant and has since been left to nature. Over the years the water levels have been reduced due to silt accumulation and disrepair of the dam and associated infrastructure has left the site needing considerable investment to create a condition that will serve both nature conservation and public amenity. Early discussions with the Lancashire Wildlife Trust have taken place, with a view to creating and declaring Primrose Lodge as Clitheroe's third local nature reserve. The only way this will occur is via the purchase of Conservation Credits from Primrose Lodge so that sufficient funding is secure for long-term, sustainable habitat creation and management.

Bids

No Bids

Offers

Minimum Order	Maximum Order	Offer Price	
1	7	bid wanted	notes
1	1	bid wanted	notes
1	3	bid wanted	notes
1	1	bid wanted	notes

Ponds - Creation

Place a new Order

Place a ☐ Bid or an ☐ Offer



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Expand to other asset classes - eg. tradable credits in the US

- Wetland mitigation credits
- Habitat conservation credits
- Water quality credits - N, P, sediments
- Bundled biodiversity credits
- Marine biodiversity credits
- Natural resource damage credits
- Mangrove credits
- Etc.....

Summary

- Biodiversity (and ecosystem service) loss continues - will create catastrophic impacts on GDP within 2 generations
- A new economic model is needed to move nature beyond intrinsic value
- A range of opportunities exist with potentially massive market value:
 - Biodiversity offsetting
 - Payment for ecosystem services
 - Corporate accounting for natural capital
 - Making farm payments reliant on environmental delivery
 - Environmental bonds

www.environmentbank.com

Environmental Markets Exchange

<https://environmentbank.mmearth.com>