



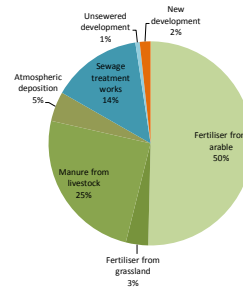
Nitrogen trading in the Poole Harbour catchment

PES Feasibility Study



Outline of talk

- Context: PES, Poole Harbour and nitrogen
- Potential of PES
- Work done during this study
- Outcomes and lessons learned



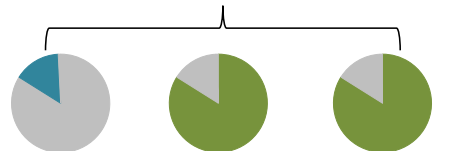
Source: Environment Agency/Natural England, 2013



Habitats Regulations

Competent authorities **must be satisfied** that a plan or project will have **no adverse impact on a European site**

New development must be 'nitrogen neutral'



Sewage treatment

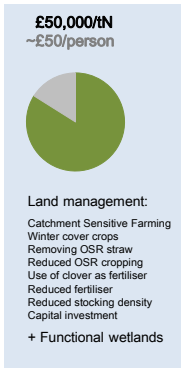
£160,000/tN
~£160/person

Land use change: reversion or wetlands

£525,000/tN
~£525/person

Land management

£50,000/tN
~£50/person



Basis for PES scheme

- Provision of clean water
- Regulation of nitrogen levels
- Mitigating and allowing new development
- Economic saving ~ £4.9M over 50 years



National Applications

Wherever nutrients limit new development
 Other Natura 2000 sites: 64 failing for diffuse pollution
 Designated bathing waters and shellfisheries
 'No deterioration' in WFD status due to phosphate



Source: Cascade Consulting for UKWIR

Evidence Base

- Environment Agency/ADA nitrate tool
- CEH review of wetland evidence
- Problems guaranteeing benefits from particular wetlands

# Sites	% sites showing a reduction	% sites showing an increase	Mean % reduction (n, sd)
70	83	20	24 (52, 146)

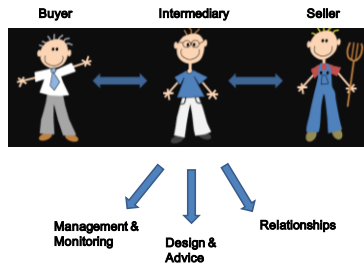


Potential 'sellers'

- Discussions with individual farmers, the NFU and CLA
- One-to-one detailed talks with ten representative farmers
- Very open to the idea
- Need for clear advice from already-trusted sources
- Problems with long contracts



Intermediaries



Picture: Westcountry Rivers Trust

Intermediaries: splitting the role

- Management** feasibility study
ongoing management must be simple
- Advice** a number of nutrient advisors
nitrate tool and statutory bodies
- Relationships** through advisors
- Monitoring** problematic
helped by easy-to-check measures



Potential Buyers

- Local authorities opted to take this role
- Time required to query and compile evidence
- Objections to paying the sector responsible for most nitrates
- Legal compliance may not be enough!



Public opinion

- Familiar with 'green slime': seen as problem, but not understood
- Expect: Central government to be setting rules
- Local government to have a 'hands on' role
- NGOs to lobby and raise awareness
- Others to act but not be driven out of business



Outcomes

- Highlighted substantial problems:
 - Objections to 'paying polluters'
 - Length of contracts
- Interest in aspects of PES, and PES-like discussions
- Importance of robust evidence and narrative

