


## Alternative Land Use Services: Valuing ecological goods & services on farmland

**Valuing Nature & Your Land**

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## VALUES

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AIR WATER FOOD / FIBRE	→	Life Support System
SPOUSE FAMILY FRIENDS COMMUNITY	→	Social System

## What are ecological goods and services?

### Ecological Goods:

- ✓ clean air
- ✓ clean water
- ✓ biodiversity:
  - wildlife
  - fish
  - species at risk

### Ecological Services:

Processes.....

- Primary production - *photosynthesis/ nutrient cycling*
- Air purification - *carbon sequestration*
- Water purification - *recharge/supply/filtration*
- Flood control - *wetlands / forests / buffers*

## What is "natural capital"?

- The endowment represented by the natural world, including natural resources - fisheries, forests, minerals, soils, etc. - but also nature's services such as climate regulation and pollutant disposal. The immense benefits humans derive from natural beauty are also the product of this form of capital
- Ecological goods and the structures & processes supporting the services that maintain them
- Natural wealth

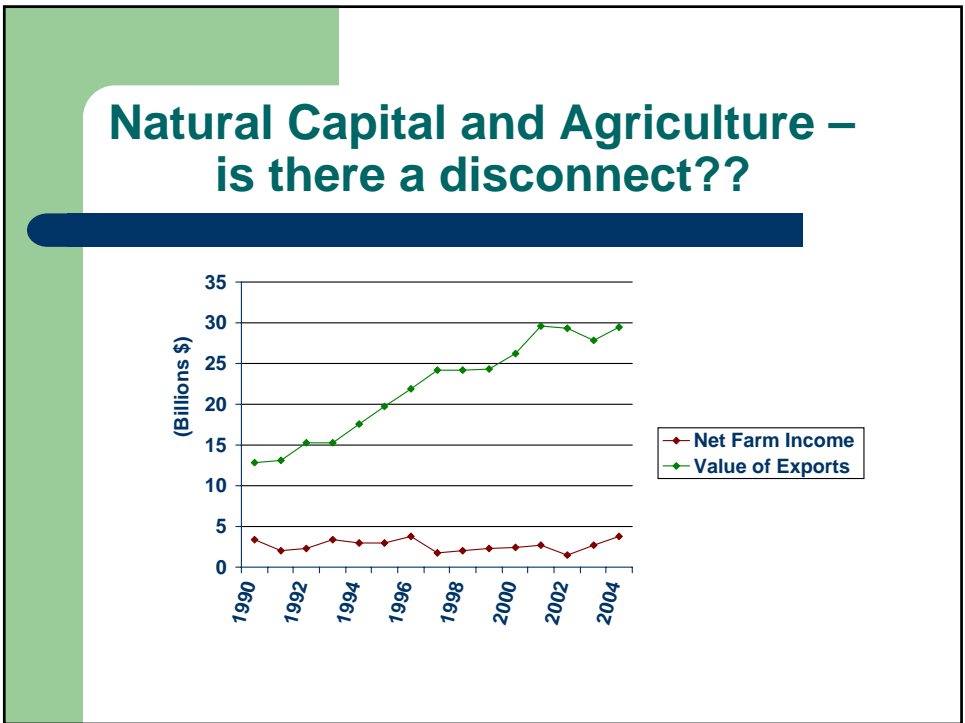
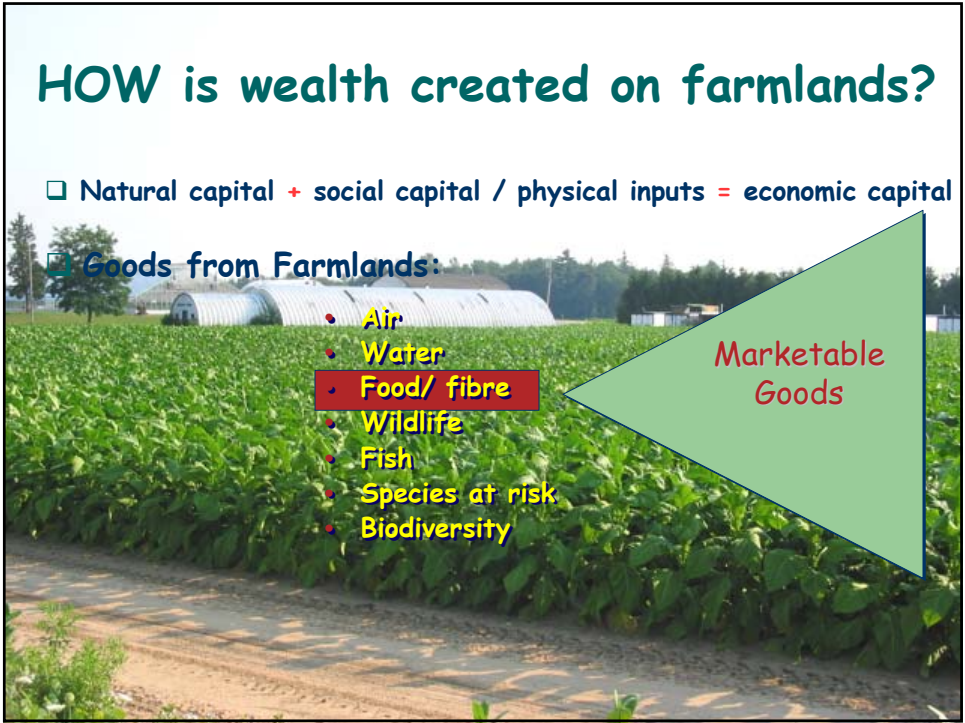
## HOW is wealth created on farmlands?

□ Natural capital + social capital / physical inputs = economic capital

□ Goods from Farmlands:

- Air
- Water
- Food/ fibre
- Wildlife
- Fish
- Species at risk
- Biodiversity

Marketable Goods





## Results - the costs of status quo?

- Erosion of natural, social and economic capital in rural Canada
- Marketplace continues to erode natural capital on farmlands
- Farm income crisis- more exports of natural capital
- A distorted global playing field for Canadian agricultural products
- \$55 Billion in direct support/ trade injury compensation;  
\$6.1 Billion more demanded
- Proliferation of ineffective regulatory approaches to environmental problems- treating symptoms not causes
- Environmental Boutique programs & projects

## The Alternative Land Use Services (ALUS) solution - a new approach

- **ALUS** is an incentive-based concept developed by grassroots farm organizations across Canada for **delivering** ecological goods & services to Canadians from farmland





## Why is ALUS needed?

- Conserving life support systems is essential on working landscapes
- Lack of a market for environmental goods is depleting natural capital
- Public demanding effective programs that deliver environmental results;




## ALUS: farmers delivering ecological services....

### Goal:

*To foster the production of ecological goods & services from privately-owned agricultural land in Canada*







### Foundation of the ALUS Partnership

*Resource Ownership on Private Lands*

Resource	Private	Public
Soil	X	
Water		X
Crop	X	
Wildlife		X
Fish		X
Livestock	X	
Trees	X	X
Air		X



## Points about the new ALUS approach....

- Paying farmers to provide Canadians with services that produce benefits such as clean air, water and wildlife habitat.....

### ☒ KEY POINTS:


- Based on ecosystem management principles
- Emphasis on environmental assets/ landscapes
- Incentives for new and some existing environmental services
- Trade neutral
- Community driven & farmer delivered
- Administered by existing agricultural organizations & agencies
- Building on existing policies & programs
- Integrating conservation programs at the community level
- Accountable and transparent program delivery

## Implementing the ALUS concept for EGS policy... *What would it look like?*

### Three levels:

1. A baseline of reasonable environmental regulations
2. Good agricultural land stewardship & business risk management (BMPs)
3. ALUS incentives to deliver on- farm ecological goods and services






## Why ALUS WILL work:

- Farmers are in the best position to manage agricultural ecosystems
- Communities are in the best position to manage local delivery of environmental goods and services (EG&S)
- Communities empowered with knowledge and resources will make good environmental decisions

QuickTime™ and a TIFF (Uncompressed) decompressor are needed to see this picture.



## Valuing ecological goods & services

### Life Support Values:

- Conserving natural capital (life support processes) by easing market pressures on the environment on working landscapes
- Securing the supply & quantity of ecological goods & services
- Treating causes rather than the environmental symptoms



## Valuing ecological goods & services

**Social Values:**


- Reconnecting Canadians with farmers, food & rural environments
- Farmers & communities acting directly to improve the environment & quality of life
- Achieving mind- change



## Valuing ecological goods & services

**Economic/ cost- savings Values:**

- Turning environmental liabilities into assets on farmlands
- Lowering reliance on costly & ineffective environmental regulations
- Leveling the global playing field for Canadian agriculture through WTO “Green Box” programs
- Securing the long- term economic sustainability of agriculture & rural communities
- Integrating environmental programs- efficiency savings
- Municipal infrastructure preventative/ maintenance savings
- Savings in other policy, program & regulatory areas



## Valuing ecological goods & services

**Value in Learning from Others:**

- World- wide loss of natural legacy
- Success of EGS programs
  - US Farm Bill
  - EU Common Agricultural Policy
  - World Bank/ GEF
- New York City Water Supply Project

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## Valuing ecological goods & services- further considerations

- EGS is more than business risk management & cost: benefits of individual BMPs
- Creating value via new public/ private markets for EGS
- Learning how to derive value from EGS policy & it's application- its about the goods **and** about delivering the services
- Determining who should value accrue to- who are the best service providers?
- Who should pay & how?
- Willingness to pay
- Basic cost of producing EGS- natural vs technological fix options to supply life support needs- water, air, climate regulation etc.
- Value is more than price & economic
- Capability of paying
- Costs of status quo- where is the road we are on going for the environment, people & agriculture?

*ALUS: Farmers and Communities growing a healthier  
environment & stronger communities...*

