

# Evaluating Property Rights and Compensatory Value Before the Utility Takes a Piece of Your Trail

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# Property Rights and Compensatory Value

## Seminar Objective:

To get you, the trail owner, thinking ahead  
( and improving outcomes )  
when negotiating compensatory damages  
due utility projects

# Property Rights and Compensatory Value

**Seminar Objective:**

**Rethink Value  
Demand Value !**

## Property Rights and Compensatory Value

- 1 Trail Property Rights
- 2 Utility “Takings” in Penna.
- 3 Trail Impacts: Construction, Post-construction, Permanent
- 4 Seeking Compensatory Value :
  - Temporary Construction Easement FMV
  - Natural Resource Damages + Loss of Recreational Access

# Property Rights and Compensatory Value

## ***1 Trail Property Rights***

**2 Utility “Takings” in Penna.**

**3 Impact: construction, post-construction, permanent**

**4 Establishing Compensatory Value**

- Appraisal of Temporary Construction Easement**

- Natural Resource Damages + Loss of Recreational Access**

# Property Rights and Compensatory Value

## Part 1 - Trail Property Rights

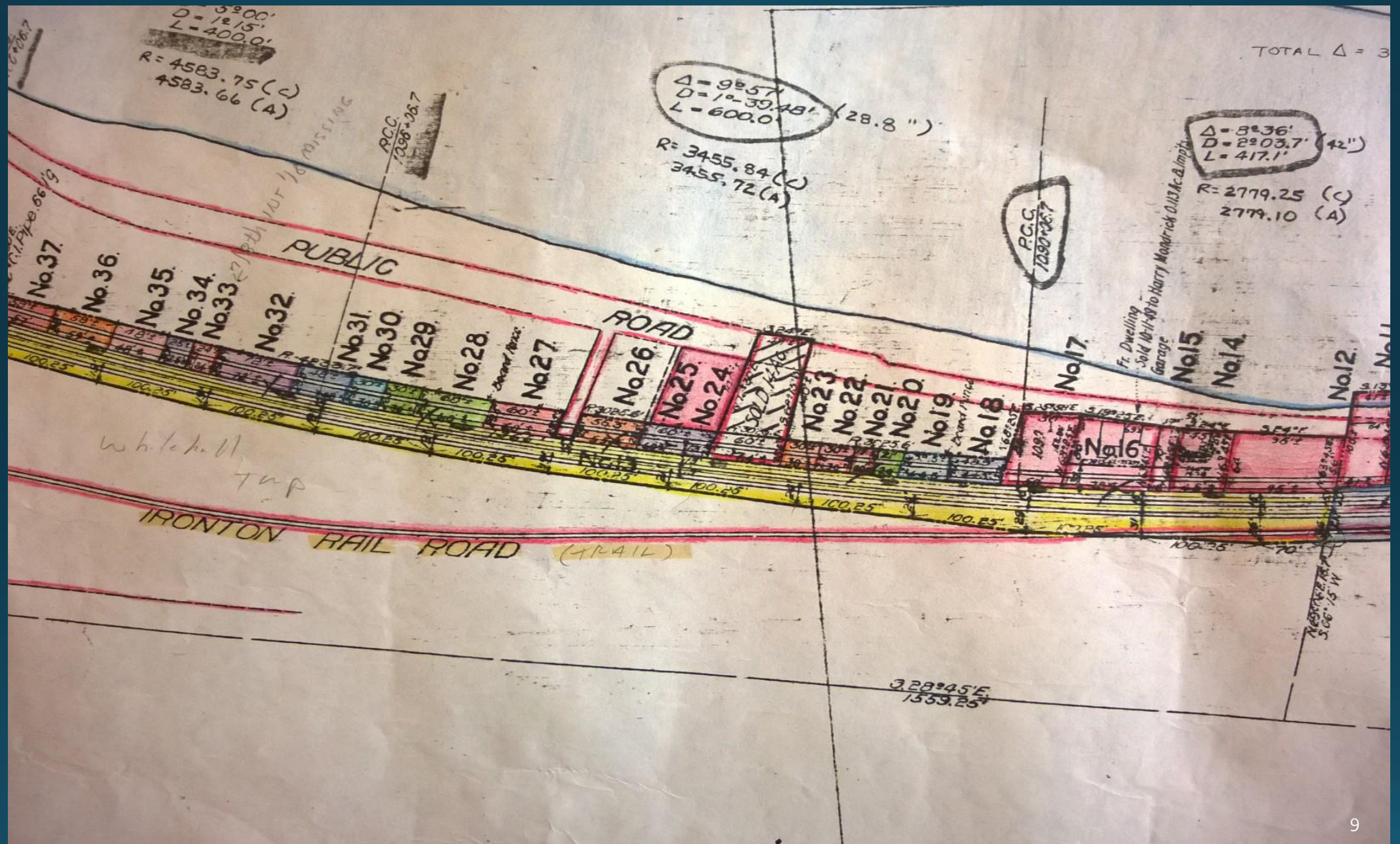
- Looks like a continuous strip ? - No, a title mosaic

- Looks like a continuous strip, right?
- Fee-simple, easement, ROW
- Lease, license, adverse possession
- Questionable color of title
- Subject to public crossings, utilities, private driveways, exceptions and reservations
- Subject to unrecorded rights (observable, survey)









## Property Rights and Compensatory Value Part 2 - Utility Takings in Pennsylvania

- 1 Trail Property Rights
- 2 *Utility “Takings” in Penna.***
- 3 Impact: construction, post-construction, permanent
- 4 Establishing Compensatory Value
  - Appraisal of Temporary Construction Easement
  - Natural Resource Damages + Loss of Recreational Access

## Utility Takings / Pipelines:

- Eminent domain: roads, RRs, electric, sewer, water, gas
- Natural gas **lines**: interstate, distribution-transmission, gathering
- Gathering **lines** excepted from Penna. eminent domain code
- Eminent domain extended to all “public authority” **lines**
- FERC auth. For new interstate **lines** ( Penna. ED code )
- Initiate: willing-buyer willing-seller negotiations



### Scope of utility takings:

- Easement / ROW that allows construction, occupancy, maintenance
- Surface use
- Subsurface use
- Temporary use
- Permanent use ( pipes + appurtenances )
- Physically defined ( survey polygon or centerline with offset )

Property Rights and Compensatory Value  
Part 3 - Impacts: Construction, Post-construction, Permanent

- 1 Trail Property Rights
- 2 Utility “Takings” in Penna.
- 3 *Construction, Post-construction, Permanent Impacts***
- 4 Establishing Compensatory Value
  - Appraisal of Temporary Construction Easement
  - Natural Resource Damages + Loss of Recreational Access

Property Rights and Compensatory Value  
Part 3 - Impacts: Construction, Post-construction, Permanent

## Impacts of Pipeline Projects :

### Construction Period :

- Site clearing to permit LOD
- Grading, trench cut, land compaction
- Removal of existing structures
- Extension of longitudinal and perpendicular access
- Establishment of materials handling, storage areas

## Impacts of Pipeline Projects :

### Post-construction :

- (Re)grade to pre-construction topography
- Replace topsoil, groundcover seeding, plants, trees
- Restore wetland and riparian areas
- Restore / replace pre-existing structures, drainage systems
- Remove temp construction access, ROWs and erect gates
- Inspect materials storage areas for contamination



Property Rights and Compensatory Value  
Part 3 - Impacts: Construction, Post-construction, Permanent

## Impacts of Pipeline Projects :

### Permanent :

- Loss of baseline biological attributes
- Diminution of *future* biological attributes
- Loss of baseline recreational use
- Diminution of *future* growth of recreational use
- Anticipated intensification of utility use ( retained rights )

- 1 Trail Property Rights
- 2 Utility “Takings” in Penna.
- 3 Impact: construction, post-construction, permanent
- 4 ***Establishing Compensatory Value***
  - *Temporary Construction Easement*
  - *Natural Resource Damage*
  - *Recreational Access Loss*

## Valuing Differential Trail Rights and Assets:

- \$ value - Temporary Construction Easement - TCE as real estate
- \$ value vs. mitigation - Natural Resources Damaged (or lost)
- \$ value - Recreational Access Lost (temporary, permanent)

## What is a Temporary Construction Easement ( TCE ) ?

- Grantor-Grantee instrument ( easement to enter and occupy )
- Purpose, location, time, compensation, indemnity, restoration
- Covers land, improvements
- Utilized in friendly *and* unfriendly (condemnation) projects
- Offer fair market value

## How is the TCE valued ?

- By appraisal of “highest and best use”
- Unit price x time *discount* = \$ TCE (FMV)
- Unit ( land: comparable sales, income, replacement cost )
- Time discount factor

## How is the TCE valued ?

- Calculation of direct damages + remainder (partial vs. full take)
- Unity of value (method)
- Restoration cost *excluded*

Property Rights and Compensatory Value  
Part 4 - Establishing Compensatory Value  
TCE vs. NRD vs. Rec. Access

**Q:** Is the TCE the *only* way to establish compensatory value for utility takings of trail property ?

**A:** No, there is a 2<sup>nd</sup> and 3<sup>rd</sup> compensatory analysis which trail owners **SHOULD** consider



**Supplemental to TCE valuation:**

- a) Natural Resource Damage (NRD) value**
- b) Loss of recreational use value**

**Both approaches can be quantified and used to establish compensatory value in utility takings of trail property**

Property Rights and Compensatory Value  
Part 4 - Establishing Compensatory Value  
TCE vs. NRD vs. Rec. Access

**a) Natural Resource Damages**

## Natural Resources Damages Valuation :

- Quantifies ecological losses
- Utilizes Habitat Equivalency Analysis model (HEA) \*
- Unit x habitat type x time x severity = \$ impact
- \$ impact *discounted* over space and time (due redemptive function)
- Sum of space-time impact = Discounted Service-Acre Years (DSAYs) \*
- DSAYs accepted for NRD litigation, court-approved settlements

Property Rights and Compensatory Value  
Part 4 - Establishing Compensatory Value  
TCE vs. NRD vs. Rec. Access

**Q: How are DSAYs converted to compensation ?**

**A: DSAYs calculate mitigation required to *offset* damages**

**A: DSAYs calculate land mitigation units, *not* cash compensation**

- Floodplain DSAYs, Wetland DSAYs, Upland DSAYs
- DSAYs establish loss due to temporary impacts
- DSAYs calculate loss due to expanded *utility* footprints (perm.)
- DSAY s derivative of comparable land or replacement unit cost (similar to TCE appraisal process )

## **DSAYs in the Delaware Water Gap:**

**Susquehanna-Roseland Electric Transmission Expansion Project**

**2012 – 2014**

**\$ 58 million NRD settlement**

Property Rights and Compensatory Value  
Part 4 - Establishing Compensatory Value  
TCE vs. NRD vs. Rec. Access

**DSAYs are used to calculate NRD**

**Now, let's calculate the value of public recreational access  
( lost )**

Property Rights and Compensatory Value  
Part 4 - Establishing Compensatory Value  
TCE vs. NRD vs. Rec. Access

**b) Public Recreational Access**  
**( calculating “loss” value )**

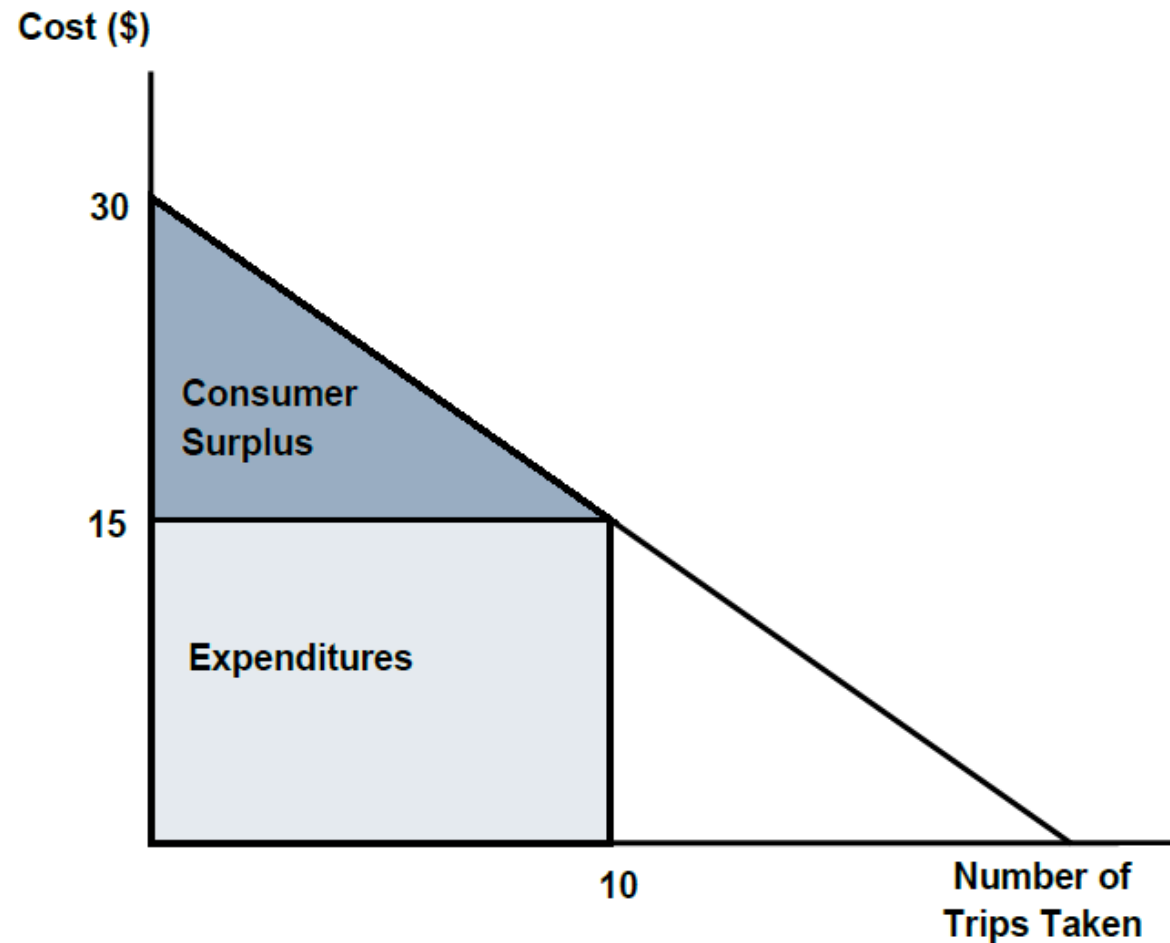


# Property Rights and Compensatory Value

## Part 4 - Establishing Compensatory Value

### TCE vs. NRD vs. Rec. Access

EXHIBIT 2-1. DEMAND FOR RECREATIONAL TRIPS



## Valuing recreational access :

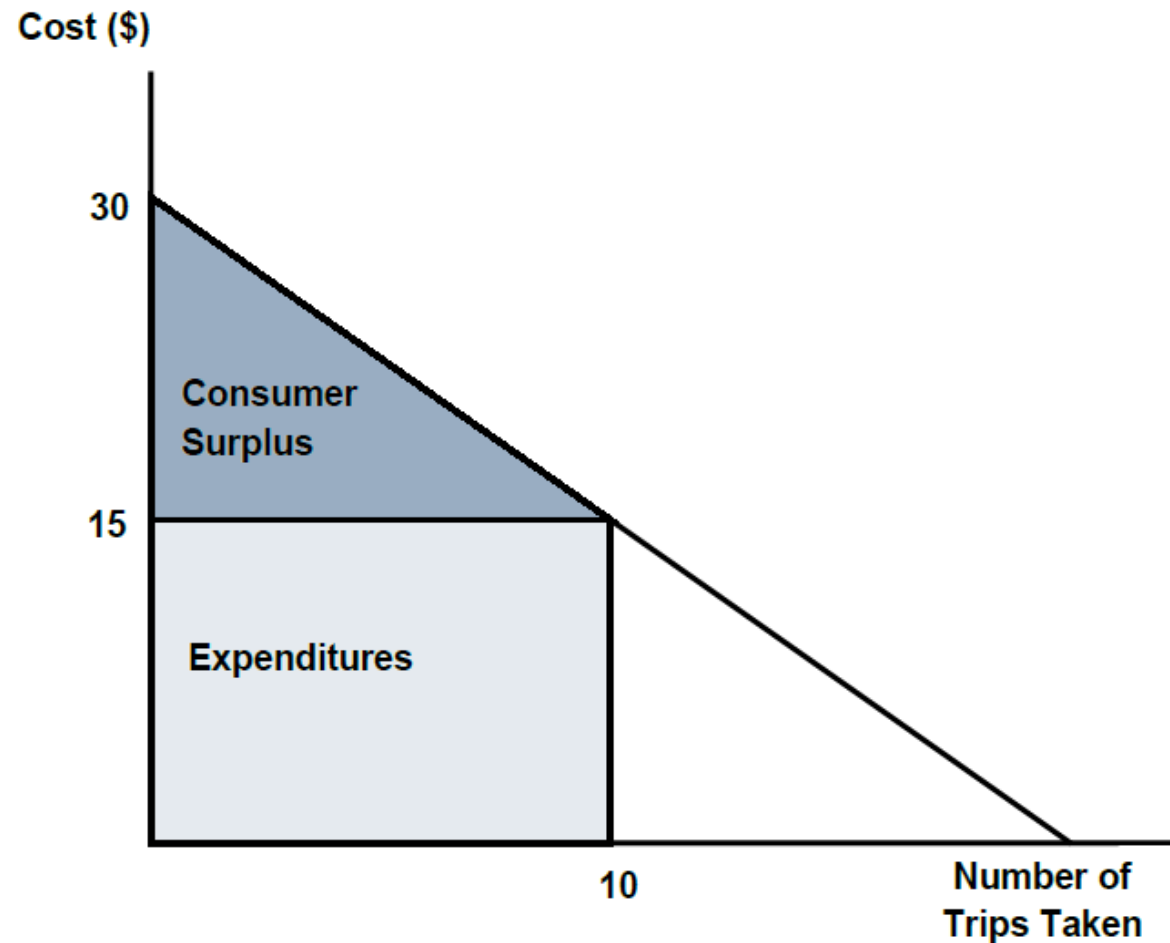
- Consumer Surplus establishes an individual's *willingness to pay beyond what is actually paid* \*
- Consumer Surplus quantifies base + surplus value per visit
- Consumer Surplus quantification for trail damages must distinguish *visit type* and *duration*

# Property Rights and Compensatory Value

## Part 4 - Establishing Compensatory Value

### TCE vs. NRD vs. Rec. Access

EXHIBIT 2-1. DEMAND FOR RECREATIONAL TRIPS



## Valuing recreational access using Consumer Surplus (con't.):

- CS requires visitor preference surveys (\$ by visit type) \*
- CS captures lost value due to recreational closure
- CS captures surplus value upon recreational *reopening*
- If surplus value is negative or parity, CSM can value \$ of lost growth

## Valuing recreational access (con't.):

- Quantify the value of each visit ( by visit type ) \*
- Value of visit determined by Consumer Surplus Model (CSM)
- CSM establishes individual *willingness to pay* OVER what is *actually paid* \*

# Property Rights and Compensatory Value

## Part 4 - Establishing Compensatory Value

### TCE vs. NRD vs. Rec. Access

	Activity	NEPA	US	200 visit / day	100 visit / day	50 visits / day ( = 100 half-day )
				200	100	50
1	Hiking	\$ 72.56	\$ 78.27			
2	Cycling, Rail-Trail	\$ 39.68	\$ 27.96			
3	Cycling, Mountain	\$ 68.72	\$ 68.72			
4	Fishing	\$ 79.94	\$ 70.78			
5	Swimming	\$ 33.03	\$ 28.74			
6	Boating, Non-motorized	\$ 43.32	\$ 44.99			
7	Wildlife Viewing	\$ 59.78	\$ 64.63			
8	Snowmobiling					
9	Cross-country Skiing					
10	General Recreation	\$ 34.53	\$ 99.04			
11	Other Recreation	\$ 37.92	\$ 58.13			
	Total value	\$ 469.48	\$ 541.26			
	<b>Per day avg. value</b>	<b>\$ 52.16</b>	\$ 60.14	<b>\$ 10,432.89</b>	<b>\$ 5,216.44</b>	<b>\$ 2,608.22</b>
	<b>Annualized avg. value</b>			<b>\$ 3,808,004.44</b>	<b>\$ 1,904,002.22</b>	<b>\$ 952,001.11</b>
	NOTE: Table relies on selected NE data (not US)					
	NOTE: Source date per Roserberger, Randall - OSU, Rec. Use Values Data Base, 2016 (add'l. data per Bowker, 2014)					
	NOTE: One Visit Day = 8 hrs.					
	NOTE: Reliable snowmobiling and xcskiing data not located					
	NOTE: Excluded from this analysis are annual marathon events, loss of organizational income					
	NOTE: No calculation (yet) for loss of growth in visits over baseline due closure and re-opening					
	NOTE: No calculation for trail maintenance cost-savings during closure period					

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