## Data Transparency and On-Line Auctions

## October 27, 2005

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While consumers will always be our primary constituency, Edmunds.com also provides data and data analysis to the automotive industry and its observers. Automakers, banks, Wall Street analysts and reporters are among those who appreciate our business-to-business information.

## Data Transparency

- Old View on Transparency
- Information as a source of control
- Sellers had information monopolies
- Auto retailing
- Travel
- Real Estate
- New View on Transparency
- Free flowing information as a source for improved systemic economics
- Power more balanced
- Amazon, Expedia, Edmunds


## Used Vehicle Values

- Used vehicle values are driven by three major forces:
- Condition
- Market Values
- Equipment


## Auction Specific Conditions

- Condition can be verified with Vehicle History Reports and photography (On-Line), or inspection (Wholesale).
- Market Values are verifiable through $3^{\text {rd }}$ Parties.
- Some Equipment may be verifiable through photography or inspection, but much is unverifiable.
- Lack of physical access to the vehicle (On-line) or the speed of the auction process (Wholesale) causes additional hedging on equipment.


## Premise

- Previous research on this topic has illustrated that Data Opacity causes equipment to depreciate faster than vehicles.
- Most visible at auction.
- Vehicles with more equipment should be more undervalued at auction.
- This should affect both on-line and wholesale similarly.


## Cost of Data Opacity on Wholesale Prices



- Average MSRP of Vehicle: $\mathbf{\$ 2 7 , 4 0 0}$
- Average transaction Price of Vehicle: $\mathbf{\$ 2 5 , 5 0 0}$
- Options as a \% of MSRP: 8\%
- Average 4.5 year Depreciation of MSRP (Auction Observations):
- Base Vehicle: 65\% of MSRP
- Options: 71.5\% of MSRP
- Additional Value lost on options At wholesale auctions: $\$ 27,400 * 8 \% * 6.5 \%=\$ 142$


## Potential Improvement of $\$ 142$ per vehicle (1.5\% of the Auction Price)

## Method

- Two vehicles tested
- 2001 Ford F-150
- Numerous High Dollar Options
- Many must be taken on faith
- 2001 Honda Accord
- Minimal Options
- All Visible
- All Transactions over the course of 1 week were analyzed
- Retail Sales
- ebay Sales
- Wholesale Auction Sales


## 2001 Honda Accord vs. 2001 Ford F-150



## Average Purchase Price

- ebay and Wholesale nearly identical
- Large disparity between Retail \& Wholesale on F-150
- Accord is in line with average
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## 2001 Honda Accord vs. 2001 Ford F-150



Retained Value

- F-150 and Accord are 0.4\% and 2.7\% above average at retail (respectively).
- F-150 retained value 6\% below average at wholesale
- Accord is 4\% above at wholesale.
- ebay is within $2 \%$ of wholesale.


## Conclusion

- Information imbalance (or the perception thereof) exists in the identification of optional equipment.
- The effect seen on ebay is a symptom of the larger problem
- No authoritative source of this data

