Automotive Industry Downstream Waste

Addressing internal competition and downstream waste in the Australian automotive industry supply-chain

Marcia Perry
Background

- This linkage project follows on from research into the automotive industry:
  - globally - European-based International Car Distribution Programme (ICDP) and
  - locally - the non-profit Australian counterpart (ICDPA).

- Since its inception - 1990s, ICDPA – has represented the major automotive manufacturers and distributors based in Australia, including Mitsubishi, Toyota, Holden (General Motors) and Ford.
Major Research Problem

- Downstream waste in the automotive industry - particularly used fleet vehicle stockpiling
- (Used fleet vehicles comprise around 60%-70% of the total pool of used vehicles.)
This project will first examine:

- internal competition between new and ‘near new’ vehicles
- downstream waste
- their impacts on the Australian automotive industry.
Research Objective

- To test the relevance of a set of contemporary management practices in redressing the problem.
Contemporary Management Practices

- These include:
  - supply chain management
  - lean production/just-in-time
  - innovation management
  - network activity
  - use of information technology/e business.
Overall Purpose

- To investigate and inform future competitive management of the Australian used fleet vehicle (AUFV) sector through the development and industry testing of a management model.
Facts and Figures

- Sales of used vehicles traditionally 3 X the volume of new vehicle sales.
  - eg. in 2003, 739,089 new passenger vehicles were sold in Australia (ABS, 2003)
  - compared with just over 1.7 million used passenger vehicles sold (ICDPA, 2004).
Facts and Figures cont’d

- Over the last five years, however, the volume of new vehicle sales has increased by 16.6%.

- Used vehicle sales have increased by 11.1%.
A contributing factor

- new vehicles being heavily marketed
- increasing array of special features and deals,

- customers now wanting to replace vehicles approaching 2 years old
Industry & National Concerns

• Market saturation
  new vehicles + internal competition (re sale of new Vs used vehicles) + overstocking of used vehicles = major concern to all the automobile industry players based in Australia.

• Major employers of semi-skilled and skilled labour in Victoria, South Australia and New South Wales

• Issue of concern to the Australian economy.
Research Phases

- Phase A: *Addressing the three research questions:*
  - in-depth interviews with AUFV supply chain managers to provide an industry backdrop
  - analysis of secondary industry databases and
  - industry survey to determine the application of contemporary management concepts.
Research Phases cont’d

- Phase B, *Model development, testing and dissemination*:
- development of a competitive model based on the findings from Phase A and related theory
- industry focus group testing of the applicability of the model
Outcomes

- Dissemination of the model to automotive industry through industry seminars, conferences
- Reports and publication of the project results in international refereed journals