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# Potential of Dense-Tracking Data

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# What drives GIS?

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- Resource management
- Cadaster
- Utilities
- Military, intelligence
- Health
- Science
- Where's the 226.8 Kg gorilla?
  - at time  $t$

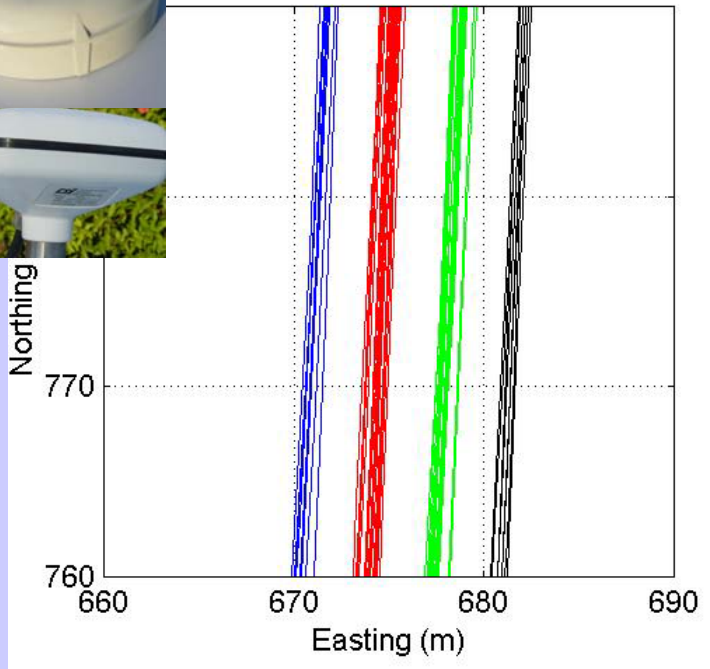
# What might drive DTD?

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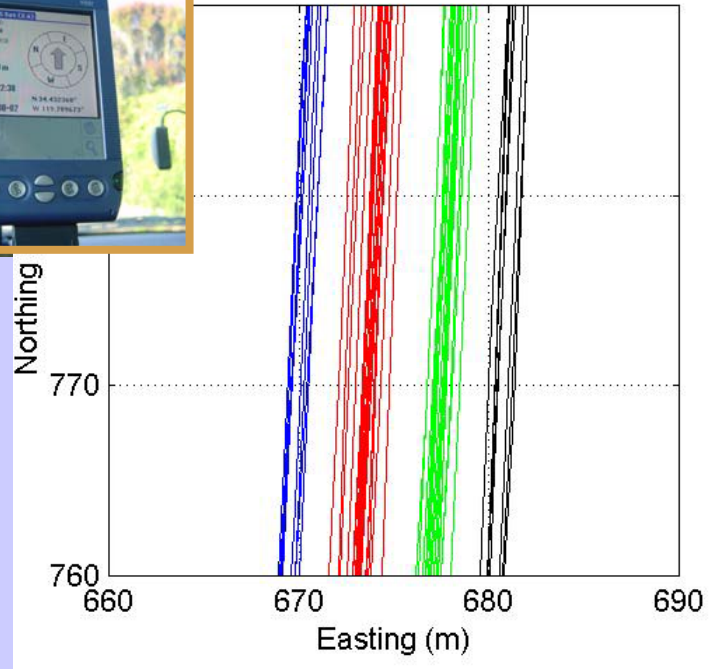
- Mapping
  - averaging tracks
  - asset management
- 911
- Congestion
- In-car navigation
- Transponders
  - OnStar, fleets
  - driver monitors
- Behavior studies
  - link ID, 250m adequate



Trimble Placer GPS 400



ian GPS Companion for Visor



# Dense sub-meter positioning

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- Lane-level navigation
- Look-ahead radar
- Lane departure
- Next-generation navigation

# Integration with other technologies

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- GPS outages
  - Atlanta, Seattle
  - NY, Hong Kong
- Inertial
- Modeling vehicles or people?
- In-building
  - microwave
  - WiFi

# Possible partnerships

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- MPOs, DOTs
  - EMS, DHS, NGA
- Mapping
  - GDT/Teleatlas, Navteq
  - Census, NGA
- Positioning technologies
- Fleet operators
- Ram's comments