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Edge of Tomorrow

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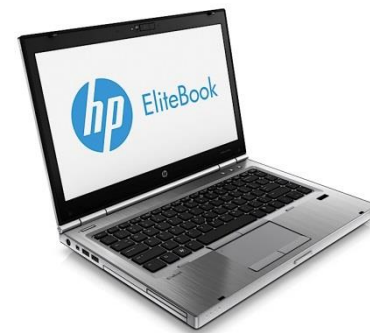
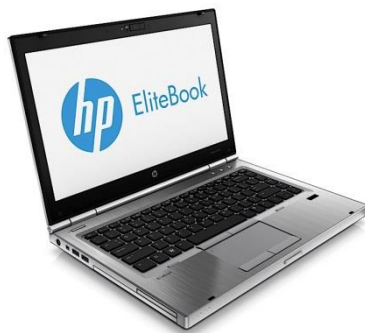
<https://www.youtube.com/watch?v=yUmSVcttXnI>



Time travel movies are big in the motion picture world.

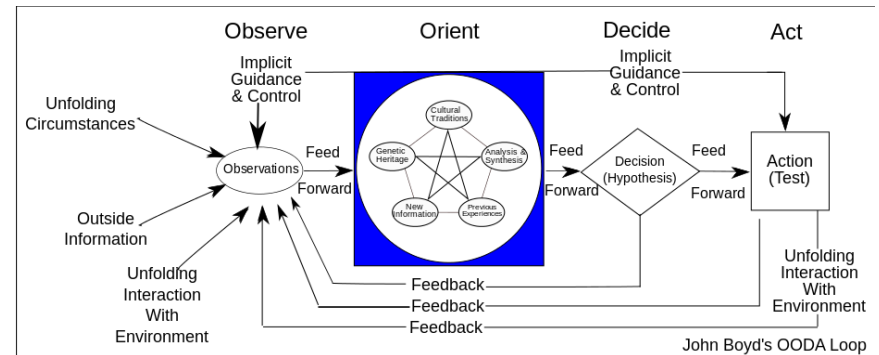
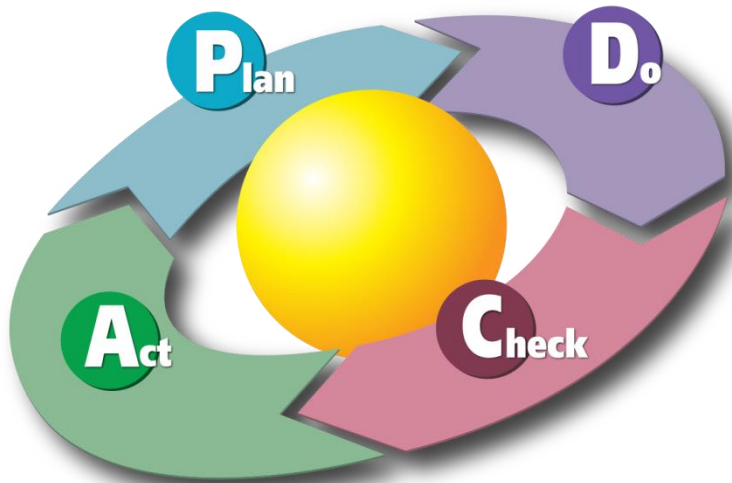
So why is this relevant for a Dutch ambulance service?

Recently we got our own “time machines” in the physical form of HP Elite laptops with a simulation package.





To understand the value of this new capability it is necessary to talk about the PDCA-cycle and the OODA-loop and their relevance for ambulance leadership





USAF Colonel John Boyd
Military strategist





PDCA

PDCA was made popular by Dr W. Edwards Deming.

Later he modified "Plan, Do, Study, Act" (PDSA) because he felt that "check" emphasized inspection over analysis.

The concept of PDCA is based on the scientific method. The scientific method can be written as "hypothesis"—"experiment"—"evaluation" or plan, do and check.

OODA

The phrase OODA loop refers to the decision cycle of observe, orient, decide, and act, developed by military strategist and USAF Colonel John Boyd.

Boyd applied the concept to the combat operations process, often at the strategic level in military operations.

It is now also often applied to understand commercial operations and learning processes.



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Emergency Medical Services

Management and Leadership
Development in America:
An Agenda for the Future



National EMS Management Association
October 2008

- ***The executive EMS officer*** is responsible for setting the vision and direction for the entire organization.
- ***The managing EMS officer*** is responsible for carrying out the executive's goals and is granted the power to make decisions to fulfill this responsibility.
- ***The EMS supervisor*** is critical in ensuring all employees live by the values of the organization. Without this level of accountability, the organization has no chance to fully embrace its strategic direction and accomplish its goals.



So what did we get?

- Executive EMS leadership makes better plans (PDCA).
- EMS Management got more flexibility in the realization of their plans (PDCA/OODA).
- EMS Operational leadership has better insight in the dynamics of ambulance care (OODA).

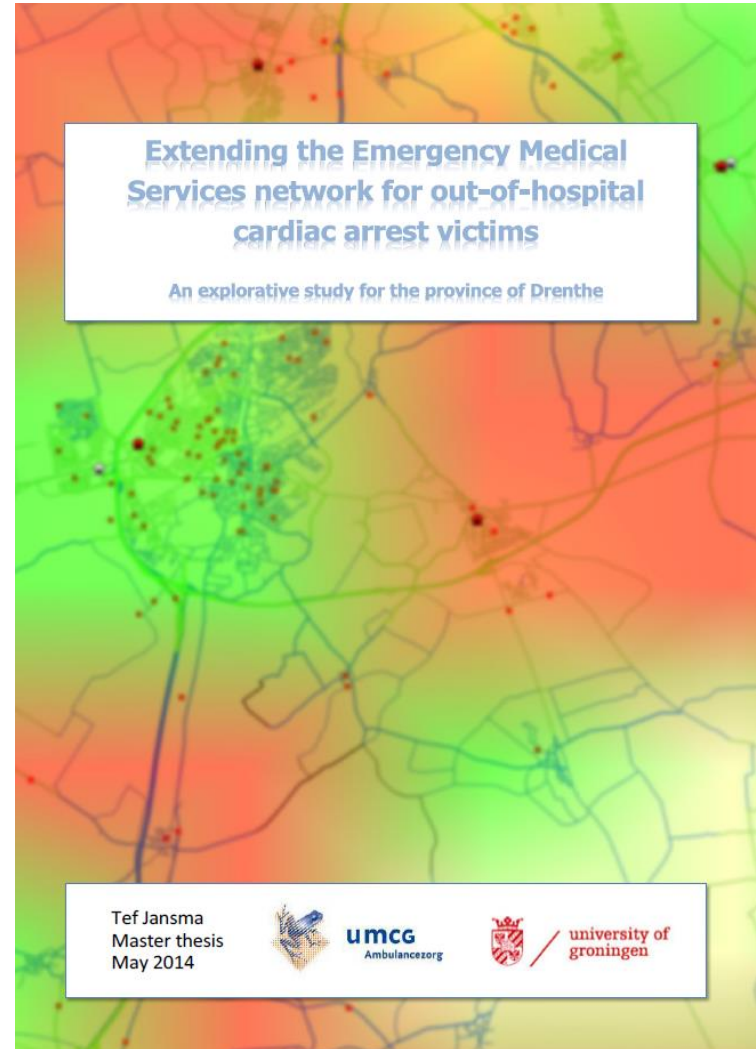


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Improving the response time performance of A1-priority calls for UMCG ambulancezorg



Rob van Werven
Master thesis
September 2012







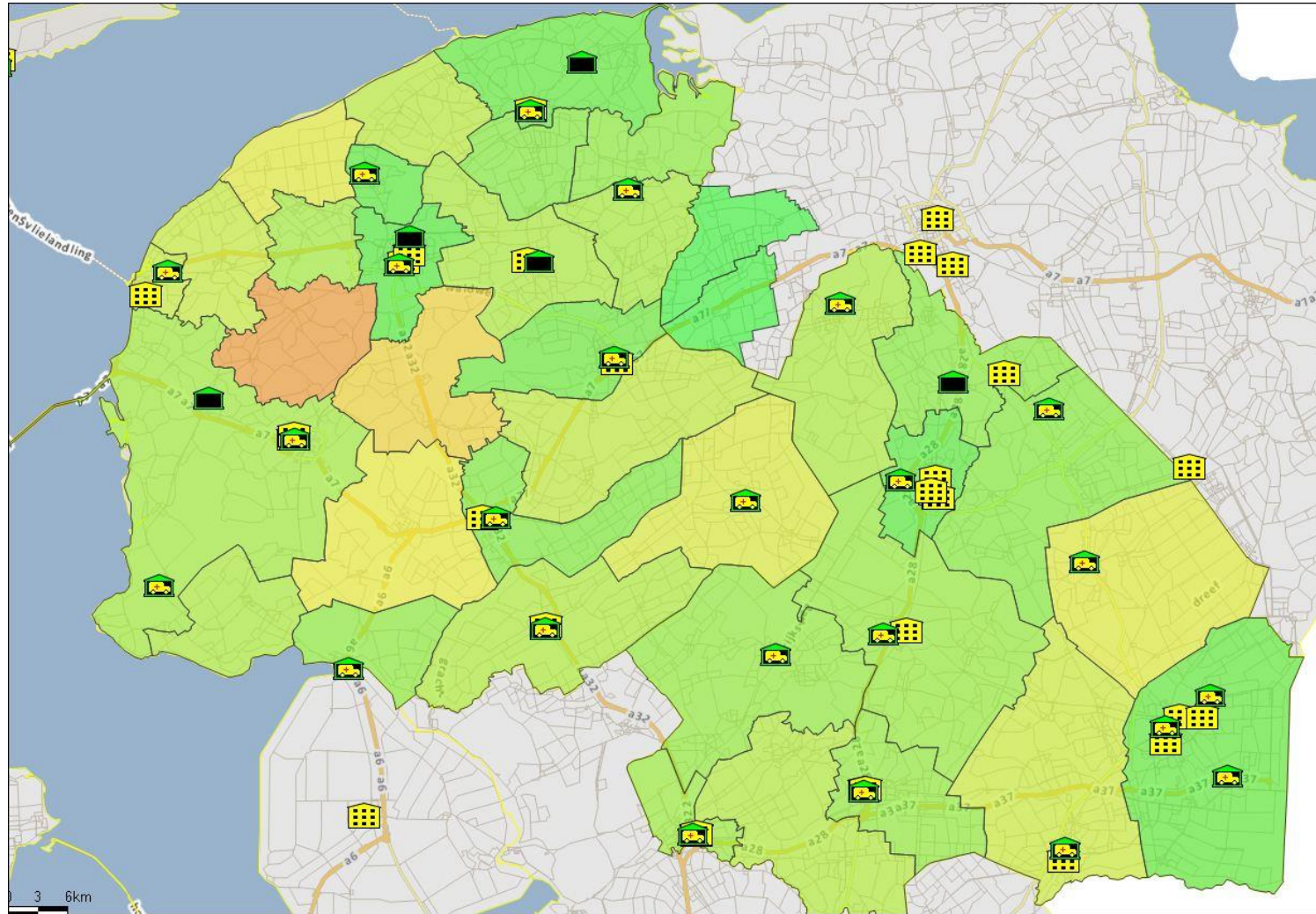
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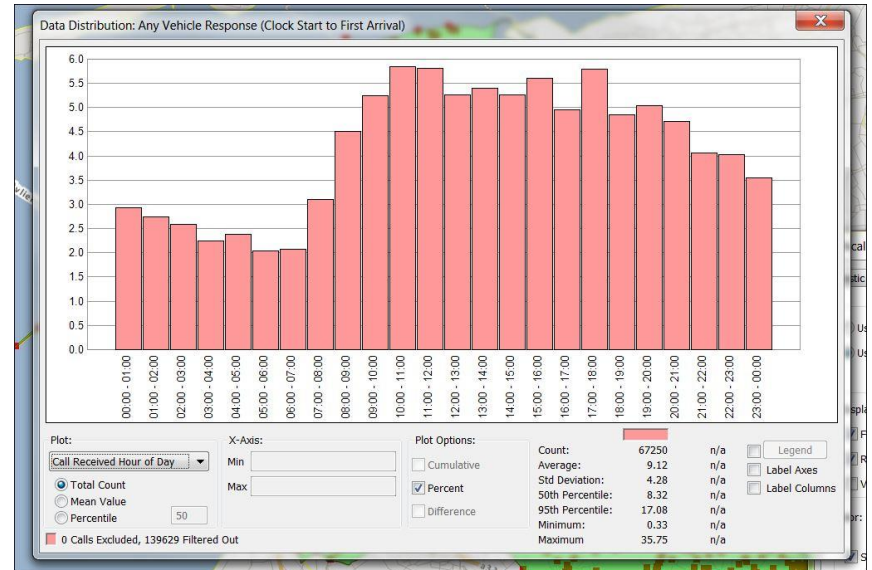
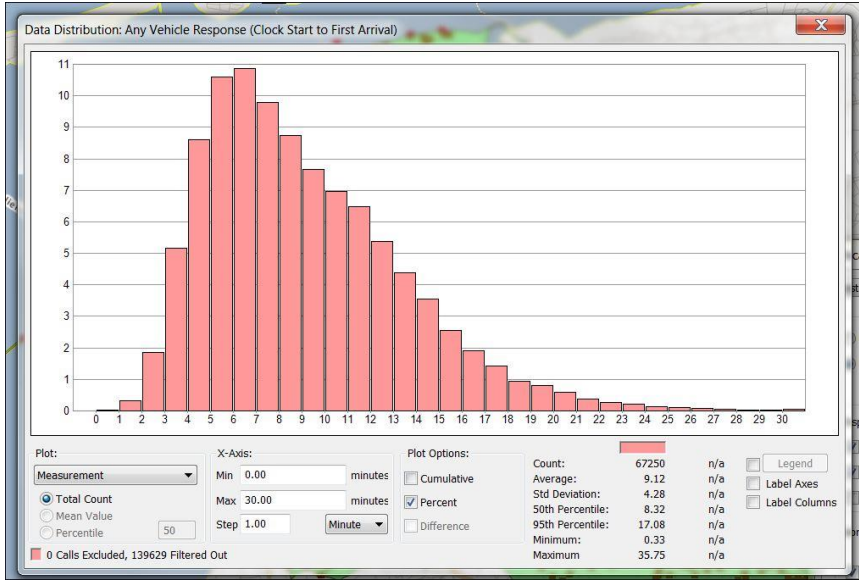




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The (near) future

We see lots of new opportunities for Big Data and OR.

Until now we mainly focused on the operational/logistic performance.

In the (near) future we will expand to medical aspects and also to models that help us optimize individual workload.

And we need to focus on (acute care) patient flow models!



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Onze visie op de toekomst



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