WENNBERG INTERNATIONAL COLLABORATIVE
SPRING POLICY MEETING 2018

FROM HEALTH CARE ATLAS TO POLICY AND GOVERNANCE TOWARDS REDUCED VARIATION AND IMPROVED QUALITY

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74 NRP Smarter Health Care National Research Programme

SSPH+ SWISS SCHOOL OF PUBLIC HEALTH

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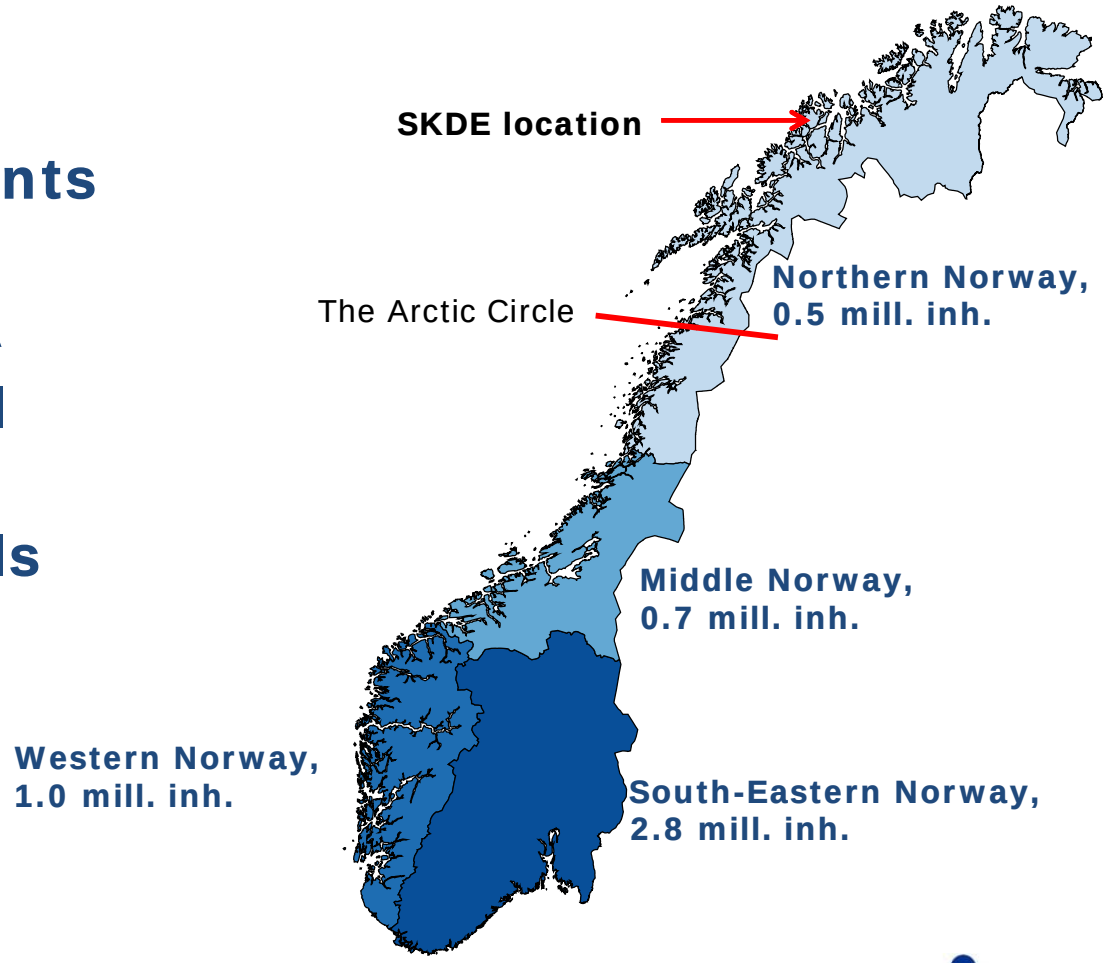
NORWAYS HEALTH CARE SYSTEM AT A GLANCE

- **5 million inhabitants**
- **4 regional health authorities – RHA**
- **19 public hospital trusts - HT**
- **50 public hospitals**



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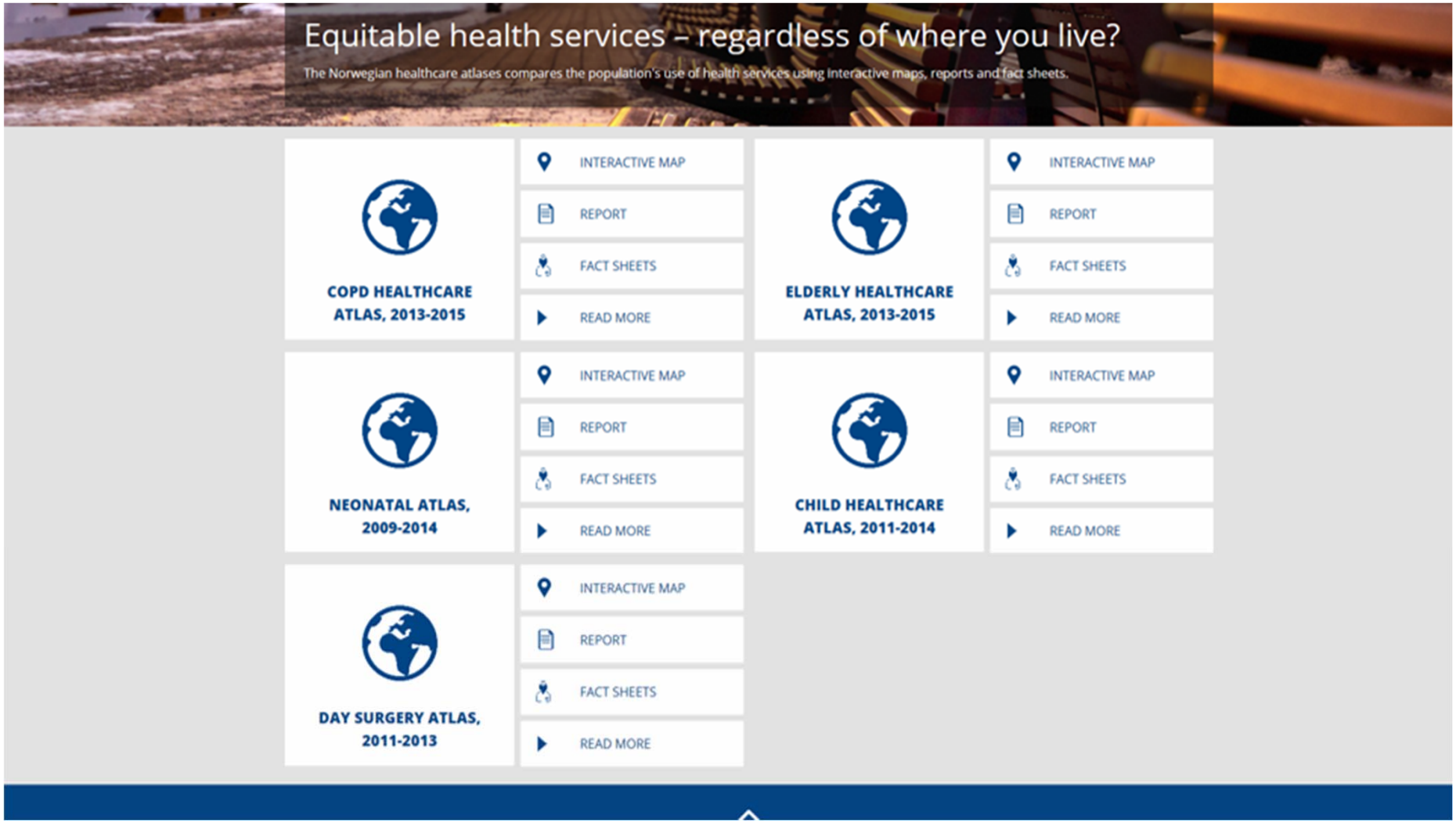

www.helseatlas.no/en

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Why health atlas in Norway?

- **Health care is mainly publicly funded**

- **Broad political consensus** about equal access to health services in Norway - regardless of living area, gender, age…
  - Universal health care system

- **Analysis of small area variation – a powerful approach to study over- and undertreatment**
  - Brownlee et al, Evidence for overuse…..Lancet 2017
  - Glasziou et al, Evidence for underuse …. Lancet 2017
  - Saini et al, Drivers of poor medical care…. Lancet 2017

- **Aim for the Norwegian Atlas project**
  - Reveal unwarranted variation
  - Engage clinicians, politicians and management
  - Hopefully stimulate change in clinical practice in Norway

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Published health atlases

- **January 2015**: **Day surgery** atlas published
- **January 2015**: The national pediatric association suggested a **child health atlas** which was published in **September 2015**
- **December 2016: Neonatal treatment** atlas published using data from a national quality register
- **June 2017:** Atlas over **Health care for the elderly** published
- **September 2017: Chronic obstructive pulmonary disease** atlas published
- **Fall 2018:** Planned update of Day Surgery atlas and Womens Health care atlas

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Political statements following public focus on health atlas results in Norway

Minister of Health Bent Høie:

"The extensive variation in the Norwegian health services is sign of system failure"

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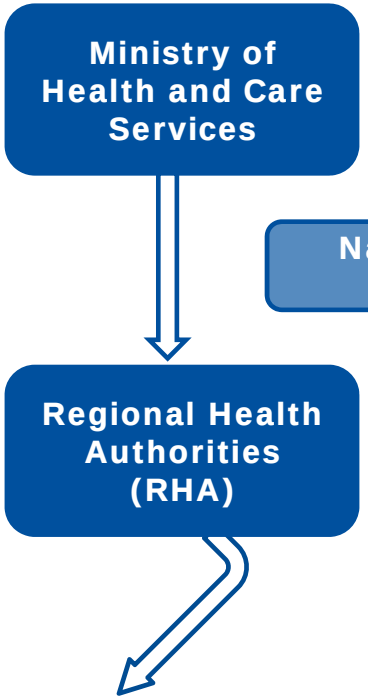
What happened in 2016?



National Commissioning document

"The Regional Health Authorities are jointly to identify indicators to measure unwarranted variation in use of selected procedures performed in many trusts – to be used for governance by the trusts in 2017

This task was assigned to SKDE

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9 national clinical indicators – strategy and process

- We identified core procedures with available national data, with sufficient volume and relevance for professionals, patients and politicians

- Registry leaders of clinical quality registries were assigned as key stakeholders in this process to ensure legitimacy, comprehensiveness, quality and clinical relevance

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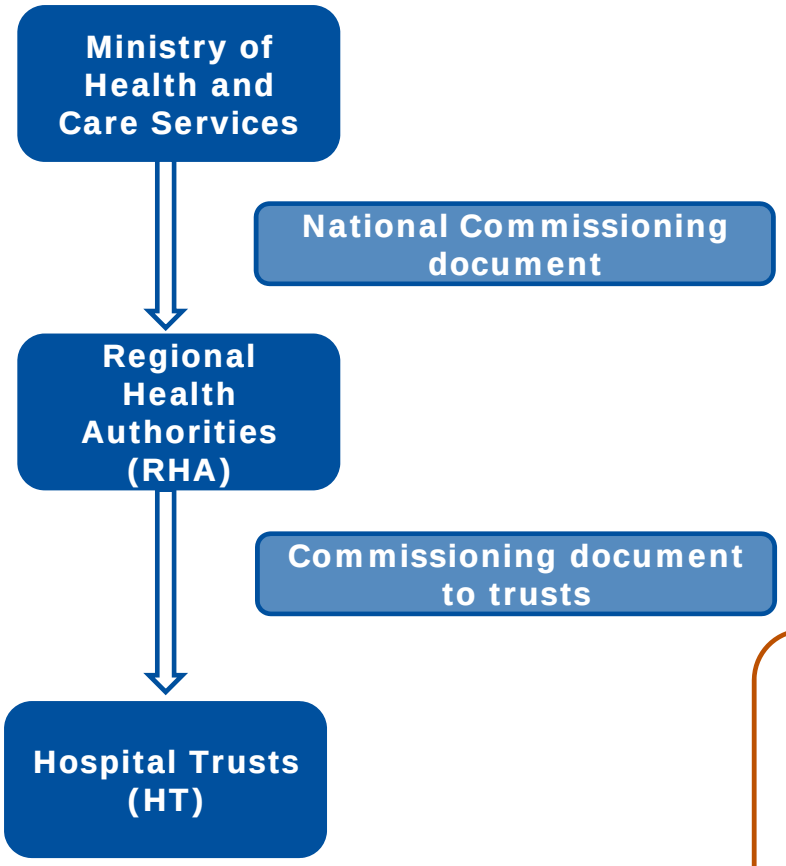
Recommended indicators for governance towards reduced variation

- 9 indicators within 5 clinical fields recommended by SKDE
  - Myocardial infarction:
    - Revascularisation within recommended time for STEMI patients (30 min/90 min)
    - Angiography within 72 hours for NSTEMI patients
  - Stroke:
    - Min. 90 % of stroke patients to be admitted in stroke units
    - Thrombolysis within 40 minutes of admittance
  - Breast cancer – > 80 % breast conserving surgery
  - Hip and knee prosthesis – assigned national production targets
  - Hip fracture – surgery within 24/48 hours

What happened in 2017?



"The targets identified in the 9 indicators for measuring unwarranted variation from SKDE are to be prioritized in the Trust work for 2017 and onwards"

Varying degrees of implementation in commissioning documents from the Regional Health Authorities

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Example:
Systematic follow-up on regional variation:
The Western Regional Health Authority

Example - Highlighted indicators by the Western Regional Authority:

Treatment	Bergen HT	Stavanger HT	Fonna HT	Førde HT	Haraldsplass hosp.
Proportion of STEMI patients < 80 years revasculated within recommended time (30 min. thrombolysis, 90 min. PCI) GOAL: > 50 %	Hospital trust referral area: 45 % Hospital: Haukeland UH 42 % Voss hosp. n<10	Hospital trust referral area: 21 % Hospital: Stavanger UH 17 %	Hospital trust referral area: 11 % Hospital: Haugesund hosp. Odda hosp. n<10 Stord hosp n<11	Hospital trust referral area: 14 % Hospital: Førde hosp. n<10 Lærdal hosp. n<10	Hospital trust referral area: 45 % Hospital: Haraldsplass hosp. n<10
Proportion of NSTEMI patients < 80 years examined by coronar angiography within 72 hours GOAL: > 50 %	Hospital trust referral area: 57 % Hospital: Haukeland UH 65 % Voss hosp. 42 %	Hospital trust referral area: 48 % Hospital: Stavanger UH 48 %	Hospital trust referral area: 38 % Hospital: Haugesund hosp. 35 % Stord hosp. 39 % Odda hosp. n<10	Hospital trust referral area: 43 % Hospital: Førde hosp. 38 % Lærdal hosp. 44 %	Hospital trust referral area: 57 % Hospital: Haraldsplass hosp.37 %

- Each trust was assigned to identify 3-5 indicators for follow-up and potential practice adjustment

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Trust's follow-up on selected topics

- Identify possible causes of high or low use of healthcare services or poor quality
- Evaluate whether the trust's deviating health care service level is unwarranted or explainable
- Establish quality improvement projects on unwarranted variation and low quality of health care services

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What happened?

The grieving process -

...some clinicians will lack the expertise to interpret data in detail and some may respond defensively…

After the Kubler Ross bereavement cycle

[with thanks to Simon Swift – East Midlands Quality Observatory]

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Examples of responses related to the "grieving process"

- On data:
  - "the data are too old – we have already changed"
  - "the data is wrong – we have different figures"
  - "the coverage of the quality registry is too low"
  - "the patient-mix and age of population is different in our referral area"

- On organization:
  - "we have a different internal organization in our hospital"
  - "in our referral area, we have private providers with deviating indications"

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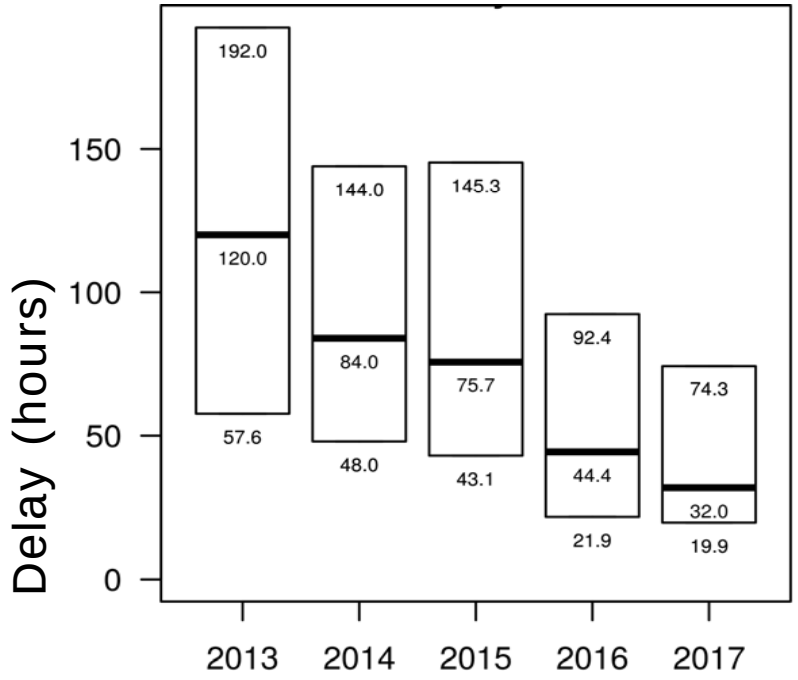
But something happened - Response from the hospital trusts:

- Example from Stavanger HT
  - Highest rate of newborns without infection given antibiotics in Norway (GA ≥ 37 weeks)
    - Quality improvement project to ensure right use of antibiotics in newborns
    - Median use of antibiotics within 6 months reduced from 1.4 % to 0,4 % of premature patients without infection
    - Project ended and implemented in regular service

Example from Bergen HT

- Too few patients with NSTEMI myocardial infarction at Haukeland UH examined by angiography within 72 hours in



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Example from Bergen HT

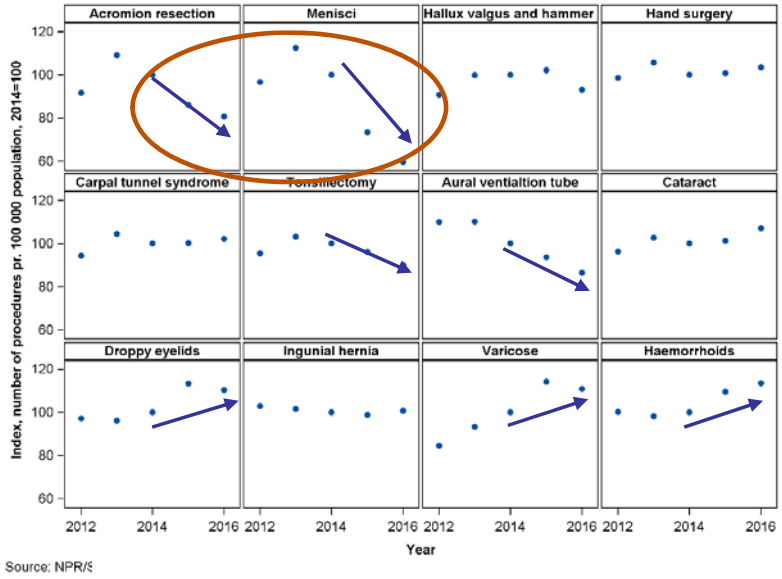
- 54 % of hip fracture patients had surgery within 24 hours – National average 65 %
- Action plan to reduced time to surgery for hip fracture patients:
  - Increased attention among clinicians on hip fracture patients
  - Hip fracture patients planned as first afternoon patients
  - Narcosis rather then spinal anesthesia for patients using anticoagulants (to avoid postponed surgery after medication)

Example from Førde HT

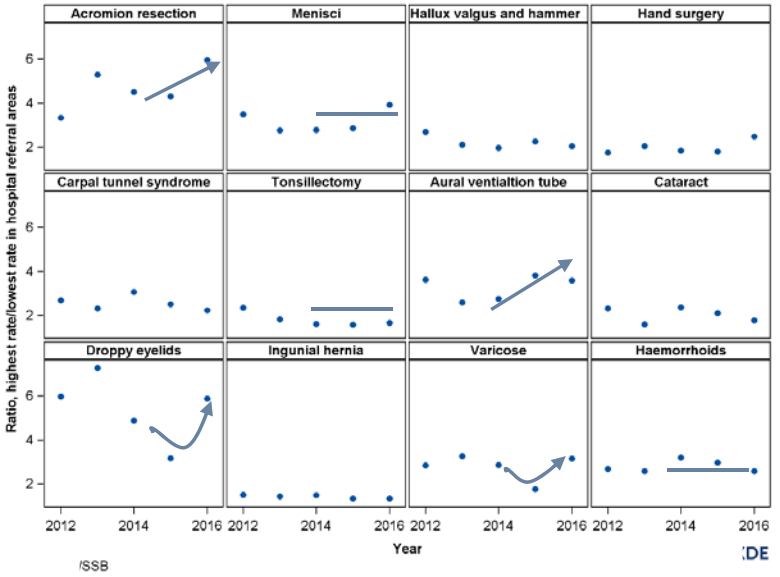
- Førde HT had the highest national appendectomy rate 2011-2014
  - To evaluate potential overuse, all cases in the period were examined
  - Acute appendicitis were histologically confirmed for 88.5 % of the patients
  - The trust concluded that the high rate was adequate and warranted

Update day surgery – change “without governance”

Number of operations



Ratio of variation



- “Dramatic” reduction where suspected overtreatment
- No obvious relation between changes in volume and ratio of variation over a time period

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What have we learned?

- Health atlases have been instrumental in engaging the Ministry of Health
- Documentation of unwarranted variation does not alone lead to desired change
- A combination of “top down” governance and professional engagement can be instrumental in leading to desired change
- Updated and “flawless” data is a prerequisite for professional acceptance of status

What have we learned?

- “Flawless” data with obvious contrasts can inspire professions if presented wisely – but it takes time and requires persistence
- The future might be bright – in Norway:
  - The Choosing Wisely campaign has engaged the professional community widely – a “bottom up” movement is emerging.

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Thank you for your attention!

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