Demography of death and dying

Year 4 core teaching week

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### Profile of People who die

<table>
<thead>
<tr>
<th>Country</th>
<th>Age at death</th>
<th>Top 3 causes</th>
<th>Disability before death</th>
</tr>
</thead>
<tbody>
<tr>
<td>UK1900</td>
<td>46</td>
<td>1. Infectious diseases, 2. Accident, 3. Childbirth</td>
<td>Not much</td>
</tr>
</tbody>
</table>
The three main trajectories of decline at the end of life

Number of deaths in each trajectory, out of the average 20 deaths each year per UK general practice list of 2000 patients

- Cancer (n=5)
- Organ failure (n=6)
- Physical and cognitive frailty (n=7)
- Other (n=2)

3 trajectories

- **Organ failure**: Months or years
- **Cancer**: Weeks, months, years
- **Acute**: Many years

GP has 20 deaths per list of 2000 patients per year

- 6: Organ failure
- 5: Cancer
- 7: Acute
- 2: Dementia, frailty and decline
“Cancer” Trajectory, Diagnosis to Death

Onset of incurable cancer -- Often a few years, but decline often < 4 months

Function

High

Cancer

Specialist palliative care available

Death

Generally predictable course, short decline
Relatively well resourced hospice care fits well
Organ failure trajectory
Organ System Failure Trajectory

Frequent admissions, self-care becomes difficult. ~ 2-5 years, but death usually seems “sudden”.

Needs: acute care for exacerbations, chronic care, support at home*. No service designed to routinely meet the needs of this pattern of decline.

*No one seems to believe we have got this even half right. Delamothe T. BMJ 2009;338:b11457
Frailty trajectory
Dementia/Frailty Trajectory

Onset of deficits in activities of daily living, speech, ambulation over time, variable up to 6-8 years, leading to death.

Function:
- High
- Low

Needs: Integrated clinical care
- Long term support at home, carer support, possibly nursing care.
- Care homes with reliably good end-of-life care.
When to shift gear?

**Caring for people with organ failure: 3 stages**

**Stage 1**  Physically well

**Stage 2**  Active supportive and palliative care

**Stage 3**  Terminal care

Caring for people with organ failure: 3 stages

Stage 1  Physically well

Stage 2  Active supportive and palliative care

Stage 3  Terminal care

Sentinel events

Gold standards Framework

Care Plan

Liverpool Care Pathway

Death
When is a patient palliative?

- Would you be surprised if Mrs A were to die within the next 12 months?
- Study in cardiology ward revealed that this question identifies 60-70% of admissions
- Avoid “prognostic paralysis*”