

Comparing interventions in Italy and UK

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See graphs below. Possibly reading too much from the graphs, but this is what I see:

- **Interventions** do appear to **have some effects**, though these arrive **about 9 days later**.
- Interventions' effect seems to be **followed by a bump** (sharp rise – ovals in plots – followed by a decrease in new cases), which could be a **secondary wave in households**
- If it really is a household-wave:
 - In Italy, it is extremely pronounced in Italy following lockdown
 - In UK, we have not seen it yet (lockdown only a week ago – effects in a few days)
 - In UK, household-waves were quite pronounced after self- & household-isolation
 - This possibly means the household-wave after lockdown (incoming) might not be as pronounced as in Italy given the “smaller” household-waves might have reduced susceptible population in households.
 - In Italy, lockdown might have roughly halted growth in cases alone (after the huge household-wave), but this is confounded by household-wave due to closure of non-essential activities.
- I'm not sure the effect of UK school closure is visible (yet) from this aggregate data.

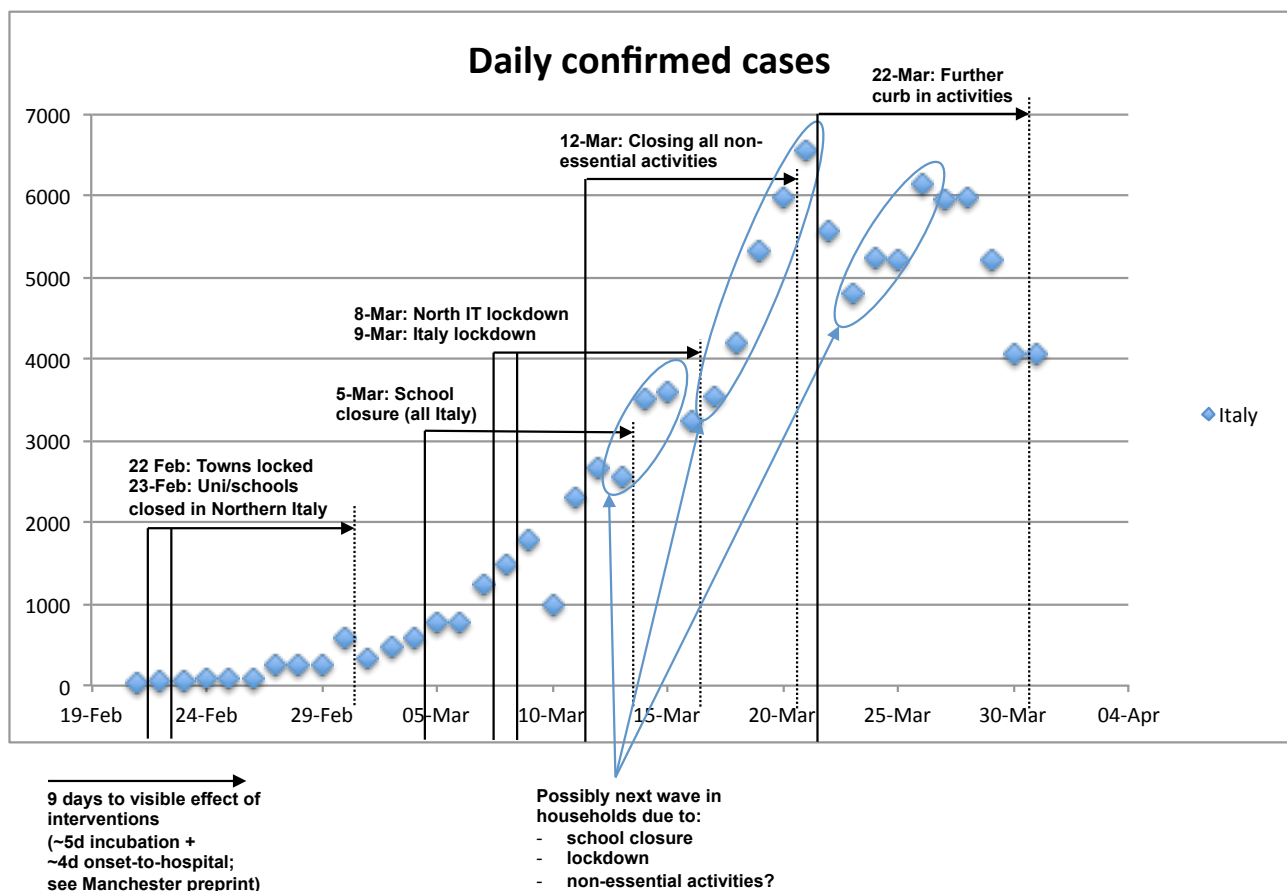


Figure 1: Daily confirmed cases in Italy, with interventions and delay to their effects. Interventions lines are immediately before the actual day from when they were in place (typically the day after being announced). The 9-day delay is assumed to be fixed for all interventions and over time, so it's just indicative.

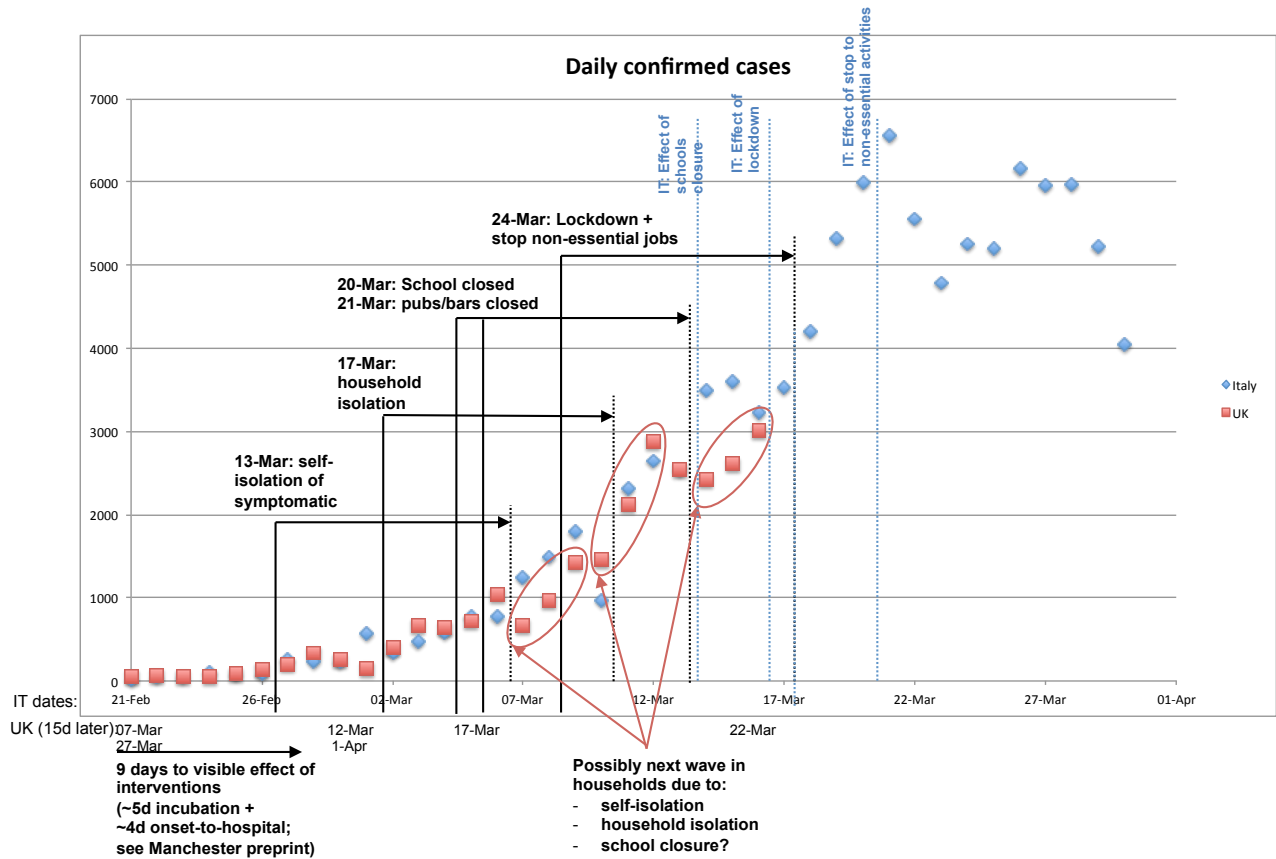


Figure 2: Daily confirmed cases in the UK (red), with interventions and delay to their effects (black lines). In the background, the Italian epidemic is shown (blue), shifted by 15 days to be aligned with the UK one. Dotted blue vertical lines refer to the effects of Italian interventions, 9 days after they were put in place.