What To do Locally Then? A series of "martyr" proposals.

It is not the purpose of this paper to tell experts and authorities what to do, we simply want to highlight a few viable and less hysterical paths to be assessed and discussed at their level with the appropriate authorities. So why not think or debate the merits of the following:

1. Testing to obtain and publish the correct mortality data.

- a. It is obvious that tests are needed, both molecular (PCR) and serological (antibodies). But the serological testing value is mostly in risk assessment and mortality rates, not in controlling a permanent state of immunity, which we know may never happen due to this type of virus. This does not mean that blocking antibodies will not be found and be usable later.
- b. Also such testing should NOT be reserved to the suspected cases, but done according to what was always done (adding random samples). Testing a whole population would not be logistically easy and would take too much time, and would essentially give the same answers as random sampling only at a higher price.
- **c.** It is the rightful priority of most governments, and economic protectionism should ideally not play any role, as tests can be bought after the appropriate validation of course.

2. Primary caregivers

- a. They should be allowed to fulfill their normal tasks/jobs in a normal way as they know how to handle most viruses and flu pandemic.
- b. Trying to micro-control the tasks they may or NOT may do as some countries have planned would just hamper their services further, and will likely increase the crisis not solve it. The **first** line is where the coronavirus can be tamed/ beaten once in the ICU it is a bit too late.
- c. All the 'moonsuits' are obviously not very useful, nor very practical, and not needed according to the statistics so why keep them? masks and gloves with all the appropriate Good Medical Practices they are trained to follow would be suffficient. Do we think doctors dare to use their stethoscopes on patients they think are lethally contagious? How many non-diagnosed cases are just being sent home? There may be a place for an accredited continuous medical education program for GP's in Infectious diseases.

3. Establish protocols.

- a. No one in active in Medicine or Public Health needs this note to establish those medical protocols and guidelines. It is however our hope that the information we gave and discussed within this note may be useful to trigger their further thinking.
- b. Treat Early with blind/empirical antibiotics then collect the swab (do not try to read the license plate of the truck that runs you over) time to adapt antibiotics later.
 - i. And antibiotic resistance should not be a huge worry if we were to use OLD molecules.
 - ii. This could protect against the frequent pneumonia and bacterial sepsis and avoid ICU trips
 - iii. However disinfecting everything all the time with antibiotic soaps will likely create antibiotic resistances.
- c. Treat the ARDS preventively Remdesevir (recently tested with success), why not Amantadine?
 - i. Preventing cell fusion decreases the immune response and the lung destructions giving the medications once at the ICU is again a bit late.
 - ii. Once alveolaes are filled with blood, the situation is unstable, any organ may suffer, and respirators are less useful this happens in all end-stage viral sepsis (and is not SARS specific).
 - iii. Assess Chloroquine or other medications in a correct way (**early**, not late when it will likely not do anything any more and not with 'cardiac' patients).
 - iv. Treating ARDS early could protect against the risk of viral sepsis and avoid ICU trips.

4. Hospitals and Infra

- a. Many people are knowledgeable in Public Health, Clinical safety, ... use their opinions and skills.
- b. Obviously this crisis begs for an organization able to separate infected patients from others this need did not start last fall.
 - i. This may require investments instead of budgetary restrictions.

- ii. There is NO need to centralize all infected patients, as most problems are likely to be with airborne pathogens, shuttling patients around is not the best move.
- iii. There are in each country many MD's and others specialized in catastrophic medicine to help taylor the adequate plans.
- c. In crisis, the normal functionning of Health care has to be preventively protected. So **all** clinicians need to be able to function normally. In a perverse way, focusing on <u>protecting</u> ICU's <u>clogged</u> those ICU's!
- d. Likewise for all institutions of Public Health they need to be re-inforced and inter-connected.

5. Strategic reserves.

- a. Keep a strategic reserve of a few items -no one needs this note to know it would be the right thing to do, hence our apologies.
- b. Antibiotics Rolling stocks kept by the manufacturers to avoid peremption and undue logistics.
 - i. The producers of 2-3 key molecules are paid to keep for example 5-10 Million doses for 2 months in a buffer storage prior selling to their markets
 - ii. First box in first box out principle this keeps the stock forever 'fresh', and could justify a markup of a few percent on the list price.
 - iii. Those boxes are to be deliverable on request.
 - iv. Doing so would never perturbate any regular medication approvision
- c. Same with critical anti-viral drugs
- d. Masks, gloves,... no comment, a few months worth of supplies, same principle: rolling stocks
- e. Respirators. To be assessed.
- f. This list far from exhaustive... Anything that we learned and was needed...

6. Avoid conflicted commercial decisions.

- a. In major crises, this is one of the most **recurrent** and vexing problem...
- b. List is known... no need to lecture colleagues and authorities here.
- c. What about a social Tracking App ? Probably the worst « good » idea!
 - i. As soon as those viruses are airborne, as it happened, this is most likely useless
 - ii. This results mosly from subtle antidemocratic and commercial constituencies pressures.
 - iii. For the few sick, why not... but never for a whole population, as one cannot IMPOSE that each citizen should carry his/her phone at all times.
- 7. There must be numerous topics that were not covered here... the aim was to provoke critical thinking, not to lecture...

8. A few moments of levity...

- a. Every crisis has its flip side... people re-discovered their family, their time, re-evaluated priorities... too much useless destruction and losses but it was self-inflicted.
- b. We are only passengers on this planet, germs existed before us and will outlive us as a species, so there is here the chance for a moment of humility as humans **cannot** control Nature, no matter how hard they may try.
- c. Using Public Health concerns as a reason to close borders is possibly the most misguided policy ever, as germs and wild life does not know of any borders so cooperation is warranted, instead of having an inter-nations contest about who has the lowest mortality rate!
- d. Recently the King of Jordan, Abdullah, wrote an Op-Ed in the Washington Post, titled: "It's time to return to globalization. But this time let's do it right." He may be onto something very deep both from human and from economical perspectives, WE all have to unite the planet, we have so many problems that are beyond the reach of individual nations... we should get out of this by gong up, not down...
 - Ref: https://www.washingtonpost.com/opinions/global-opinions/its-time-to-return-to-globalization-but-this-time-lets-do-it-right/2020/04/27/b5e8b442-88b4-11ea-8ac1-bfb250876b7a_story.html
- 9. And a not so stupid question... Now that the first phase is over, and that authorities are debating the re-opening of society, wouldn't it be a good time to stop the attacks and start looking very favorably at what Sweden did? No need to be afraid if we have a functioning first medical line, and if we focus of the persons who are the most at risk. Real mortality rate is the same in Sweden as everywhere.

Let us all remember that there is no place to blame, not for competition between States, just avoid both extreme positions, which are both equally invalid.