Management of the COVID-19 Health Crisis: A Survey of Swiss Health Authorities’ Responses

Laurence Schumacher PharmD, PhD1,2, Josiane Tinguely Casserini PharmD, PhD3,4, Pascal Bonnabry PharmD, PhD1,2 and Nicolas Widmer PharmD, PhD1,5

1Specialised Centre for Emergency and Disaster Pharmacy, Institute of Pharmaceutical Sciences of Western Switzerland, University of Geneva, Geneva, Switzerland; 2Pharmacy, Geneva University Hospitals, Geneva, Switzerland; 3Directorate of Health of the Canton of Basel-Land, Liestal, Switzerland; 4Center for Health Law and Healthcare Management, University of Bern, Bern, Switzerland and 5Pharmacy of the Eastern Vaud Hospitals, Rennaz, Switzerland

As of 2020, the coronavirus disease (COVID-19) pandemic put an enormous strain on national health care systems and regional health authorities.1 A survey of Switzerland’s health authorities was done to describe the actions undertaken and challenges encountered by 3 groups (cantal medical officers [CMOs]; cantonal pharmacists [CPs]; and Swiss federal authorities) during the pandemic’s first wave. This work, integrating previous literature,2–4 aimed to generate valuable information on how to improve pharmaceutical management in future health crises. An electronic survey was sent to Switzerland’s CMOs, CPs, and the relevant federal health authorities: the Federal Office of Public Health (FOPH), the Federal Office for National Economic Supply (FONES), and the Swiss Agency for Therapeutic Products (Swissmedic). The questionnaire was organized into 10 clusters of questions covering many topics regarding the management of the COVID-19 crisis. Data collection occurred from July 20 to September 30, 2020.

Analyses were performed on the 33 questionnaires returned (54%) out of 61 sent. Both federal (100%; 8/8) and cantonal (60%; 15/25) authorities had prepared their own internal pandemic plans after the 2009 H1N1 pandemic and before the COVID-19 pandemic. Among the cantonal authorities, 67% (10/15) of CPs and 50% (5/10) of CMOs have used their internal pandemic plan. To minimize drug shortage problems during the first wave, the Swiss Armed Forces Pharmacy quickly purchased drugs such as lopinavir/ritonavir (a suggested treatment at that time) on the open market and delivered them to CPs to distribute them onward within their cantons. At the beginning of the crisis, there was a precarious bottleneck in the availability of ethanol for hand sanitizers, notably due to the lack of reserves at the alosuisse warehouses (former federal importer privatized in 2018). Health authorities’ planning for sustainable supplies of this product was nevertheless rated as satisfactory by 47% (9/19) of all respondents. This was because the FOPH’s rapid response has been to issue a general authorization facilitating the manufacture and sale of biocidal products by pharmacies and other stakeholders. A chemical company, among others, also provided an important supply of disinfectant based on the World Health Organization’s formula. In contrast, respondents considered that professional expert opinions had not been consulted frequently enough during the purchase of personal protective equipment (PPE) by Switzerland’s health authorities. Moreover, respondents stated that which of the different federal executive departments had the ultimate responsibility for this material’s availability was unclear. Cantons mostly assessed their requirements for PPE to protect their health care workers from COVID-19 contamination via email (69%; 11/16) or telephone (38%; 6/16). Distribution of PPE at the cantonal level was mainly done using a scattergun approach (56%; 9/16) or according to need and health care mandate, thanks to the creation of online shops (31%; 5/16).

Switzerland’s health authorities thus encountered many challenges during the COVID-19 disaster, and the survey revealed that they had to quickly find effective solutions. Most respondents advocated for the maintenance of stockpiles of medicines and PPE at wholesalers and in hospital pharmacies and of disinfectants at alosuisse to manage future crises. Equally, the competent federal and cantonal authorities would like regular simulation exercises to ensure better preparation for such crises, as these are already performed in some hospital settings in Switzerland.5

**Author contribution.** LS: conceptualization, methodology, writing the original draft; JTC: conceptualization, data curation, formal analysis, investigation, methodology, writing the original draft; PB: conceptualization, funding acquisition, methodology, supervision, writing, reviewing, and editing; NW: conceptualization, funding acquisition, methodology, supervision, writing, reviewing, and editing.

**Funding statement.** This study was partly funded by the Swiss Federal Department of Defence, Civil Protection and Sport, through the Centre of Competence for Military and Disaster Medicine.

**Competing interest.** The authors have no potential conflicts of interest to declare.
References


