Pediatric Hospital Medicine Management, Staffing, and Well-being in the Face of COVID-19

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Our modern world is facing an unprecedented global health crisis caused by the rapid spread of a novel coronavirus that causes coronavirus disease 2019 (COVID-19), which was officially declared a pandemic by the World Health Organization (WHO) on March 11, 2020.[1] The Centers for Disease Control and Prevention (CDC) has urged US hospitals and healthcare systems to rapidly prepare for patient surges that risk overwhelming their resources.[2] Hospitalists are instrumental in coordinating the inpatient response. While this is a rapidly evolving situation, we will describe the initial logistical response of our academic pediatric Hospital Medicine division in terms of management, staffing, and wellness. Recognizing that early evidence from China described low inpatient pediatric disease burden,[3-5] our focus has centered on preparing to care for infected or potentially infected children, preserving staff and resources to ensure safe and effective care, and preparing to assist the adult response.

MANAGEMENT AND COMMUNICATION

Establish a Command Team

We benefit from having an existing divisional leadership structure comprising the director, medical directors of our clinical service lines, directors of education and community integration, and associate directors of clinical operations, research, and quality. This established team provides us broad representation of team member expertise and ideas. We maintain our weekly leadership team meeting through video chat and have added daily 30-minute virtual huddles to provide updates from our respective areas and discuss logistical challenges and planning. We use ad hoc phone meetings with relevant team members to address issues of immediate concern.

In the absence of a formal leadership team structure, establish a command team comprising representative leaders of your varied groups (eg, clinical operations, quality improvement, education, research, and business).

Collaborate With Institutional Response

Align divisional command team actions with the institutional response. Our clinical operations leader serves as our primary representative on the institutional emergency preparedness team. This participation allows bidirectional communication, both for institutional updates to be shared with division members and division-specific initiatives to be shared with institutional leadership to facilitate learning across the system.

In conjunction with hospital leadership, our division created a special isolation unit (SIU) to isolate patients positive for COVID-19 and persons under investigation. The institutional emergency preparedness team highlighted the need for such a unit, and our divisional leadership team developed the physician staffing model and medical care delivery system. We collaborated with key stakeholders, including nurses, respiratory therapists, other patient care services members, and subspecialists. The SIU leadership, which includes representatives from hospital medicine, nursing, respiratory therapy, and hospital operations, holds regular phone huddles to provide support and enlist resources based on identified gaps, which allows the frontline SIU physicians to focus on patient care. The calls initially occurred twice daily, but we transitioned to a once-daily schedule after routines were established and resources were procured.

Communicate With Everyone

Frequent communication with the clinical staff is paramount given the rapidly evolving operational changes and medical management recommendations. The divisional leadership team provides frequent email updates to the attending physicians on clinical shifts to communicate clinical updates, send reminders to conserve personal protective equipment (PPE), and share links to COVID-19 resources.

We use our weekly divisional meetings, now held virtually, to provide updates and to allow staff to ask questions and provide input. These meetings routinely include our nonclinical staff, such as administrative assistants and research coordinators, to ensure all team members' voices are heard and skill sets are utilized. Our divisional infrastructure promotes dialogue and transparency, which is key to our division's culture. Applying a learning health network approach has allowed us to generate new ideas, accelerate improvement, and encourage everyone to be a part of our community focused on improving outcomes.[6] We continue to leverage this approach in our pandemic response.

One idea generated from this approach prompted us to create a centralized communication forum, using Microsoft Teams, to serve as a repository for the most up-to-date information related to COVID-19, the SIU, and general information, including links to divisional and institutional resources.

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TABLE. **Divisional Survey to Assess Childcare Needs**

Name:
Children (names / ages):
What is your current childcare? (daycare, nanny, school with afterschool care, other family member, etc.):
If you have children old enough to babysit, would you be willing to have them watch other children in: • their home • my home • either • NA (my kids aren't old enough to babysit)
In the event of a need to provide childcare to our kids while still ensuring enough physicians to provide patient care, would you be willing to watch other kids while not on clinical care?
What other ideas or thoughts do you want to share for us to think about?

Note: We used our division's internal demographic database to match families in geographic proximity.

Maintain Nonclinical Operations

Nonclinical staff are working remotely. The business director and research director hold daily calls with the administrative staff and research coordinators, respectively, to discuss workload and to reallocate responsibilities as needed. This approach allows the business, administrative, and research support teams to function efficiently and redistribute work as the nonclinical priorities shift to meet divisional needs.

STAFFING

Establish a Backup Pool

We anticipate needing a larger pool of backup providers in the event of ill or quarantined staff or in case of increased patient volumes. The latter may be less likely for pediatric patients based on early studies[3-5] but could occur if our free-standing children's hospital expands to include the care of adult patients. We asked physicians to volunteer for backup shifts to augment our existing "jeopardy" backup system with a greater request to those with a lower clinical full-time equivalence. Each day, two backup shift positions are filled by volunteers, with additional positions added on days when medicine-pediatrics providers are scheduled for shifts in case they are needed at the university (adult) hospital.

Minimize Staffing to Reserve Pool

We monitor census closely on all service lines, including our consult service lines and secondary inpatient site, with plans to dissolve unnecessary consult services and combine medical teams, when feasible, to reduce the risk of staff exposure and maintain reserves. For example, after elective procedures were canceled, we reduced physician staffing of our surgical comanagement service to the minimal necessary coverage. We assign nonpatient-facing clinical duties to physicians who are called off their shift, in quarantine, or mildly ill to help off-load the clinical burden. Such duties include accepting direct admission phone calls, triaging patient care calls, entering orders remotely, and assisting with care coordination needs.

Anticipate Adult Care Needs

Our pediatric institution admits select groups of adult patients with congenital or complex healthcare needs who require specialized care. Hospitalists board certified in both pediatrics and internal medicine provide consultative services to many of these patients. Anticipating that these physicians may be needed in adult facilities, we plan to dissolve this consult service and utilize our reserve pool of providers to cover their pediatric shifts if needed. Additionally, if our hospital expands coverage for adult patients, these medicine-pediatrics providers will be instrumental in coordinating that expanded effort and will serve as leaders for teams of physicians and advanced practice providers with limited or no adult medicine training.

Special Isolation Unit

Logistic planning for our SIU evolved over the first few patients with rapid-cycle feedback and learning with each admission. This feedback was facilitated with our twice-daily huddle calls, which involved all key stakeholders, including nursing and respiratory therapy representatives. For division physician staffing, higher-risk team members are excluded from working on this unit. Because the SIU was developed to care for all patients positive for COVID-19 and persons under investigation, subspecialty patients not typically cared for by Hospital Medicine at our institution are being admitted to this unit. Therefore, subspecialty divisions assign attending physicians to provide consultative services to the SIU. These consultants use the unit's telemedicine capabilities, when feasible, to limit staff exposure and conserve PPE. Our hospital medicine leaders in the SIU proactively worked with subspecialty divisions that are anticipated to have more admissions given their at-risk patient populations, such as pulmonary medicine, cardiology, and oncology. They specifically developed staffing plans for these patients if the SIU census becomes unsustainable under Hospital Medicine alone.

STAFF WELL-BEING

Healthcare workers are experiencing numerous stressors at work and home during this tumultuous time. Our workforce

is at risk of developing emotional distress and mental health concerns. A cross-sectional survey of more than 1,200 healthcare workers in China who cared for COVID-19 patients found that many experienced symptoms of psychological distress (71%), as well as depression (51%), anxiety (44%), and insomnia (34%).[7] Hospital medicine groups should consider methods to support their staff to mitigate stressors and promote self-care.

Anticipate Childcare Issues

When we were faced with impending school and daycare closures, we surveyed our division to assess childcare needs (Table) and share resources. We created a system of emergency childcare coverage options by connecting parents with similarly aged children and who lived in geographic proximity. This approach to childcare contingency planning was shared with and adopted by other divisions within the institution.

Build Support Measures

To support each other during this particularly stressful time, we divided division members into groups or "support pods," each facilitated by a leadership team member. Group text messages and weekly phone or video chats have promoted connectivity and peer support.

Promote Self-care

The divisional leadership team provides food and drink for staff on clinical shifts. We also collated self-care resources to share via a central repository. These resources include ideas for meditation, home education for children, parenting, exercise, faith communities, entertainment, methods to support our local community through volunteerism and donations, and mental health resources, as well as online links to these resources.

Adult health systems will be disproportionately affected as this pandemic evolves. Pediatric hospitalists have the unique opportunity to support the response efforts by maintaining teams that are flexible and adaptable to evolving community needs. To do this, team leaders need to promote transparency, share learnings, and leverage the diverse skills of team members to ensure we are ready to meet the challenges of the moment.

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