Stroke Systems of Care during the pandemic in SEAR countries

For more than a year, the SARS-CoV-2 pandemic has had a devastating effect on global health. High-, low-, and middle-income countries are struggling to cope with the spread of newer mutant strains of the virus. Delivery of acute stroke care remains a priority despite the pandemic. To maintain the time-dependent processes required to optimize delivery of intravenous thrombolysis and endovascular therapy, most countries have reorganized infrastructure to optimize human resources and critical services. Low-and-middle income countries (LMIC) have strained medical resources at baseline, and often face challenges in the delivery of stroke systems of care (SSOC). The situation is similar in South East Asian Region countries.

During the peak of the pandemic in the region the stroke admissions had fallen and the number patients who received acute recanalization therapies like intravenous thrombolysis and mechanical thrombectomy declined. The stroke unit and rehabilitation beds have been reallocated for COVID-19 care.

World Stroke Organisation (WSO) recommends emergency department screening of stroke patients for COVID-19 and protected stroke code to be activated for COVID-19 suspect stroke patients. Patients with suspected stroke should not delay hospital evaluations. An ambulance should be used whenever feasible to bring the patients to the hospital, however a personal conveyance can be used if needed rather than delaying acute stroke care. Paramedical staff should wear appropriate personal protective equipment (PPE) during screening and transport. Noncontrast computed tomography (CT), CT angiography, and CT chest are the imaging modalities of choice. All health care professionals involved in triaging, imaging, and stroke care should wear appropriate PPEs. All eligible stroke patients (COVID suspect/positive/non-COVID) should receive intravenous thrombolysis/mechanical thrombectomy. Patients should be managed in stroke units (SUs) and modified protocols for SU care should be established and followed. Secondary prevention medications should be started in a timely manner in all stroke patients. Planned discharge should be organized for all patients. Limited rehabilitation should be offered to patients and training of caregivers if needed. Telemedicine or WhatsApp consultations can be used for follow-up. We should not forget about the stroke prevention through the National non-communicable diseases (NCD) programs. Availability of drugs to control the NCDs is crucial during the pandemic since COVID-19 patients with comorbid NCDs have a poor prognosis.

COVID-19 has forced us to rethink our strategies and reinvent our systems. The introduction of “protected pathways”, modified stroke protocols and adoption of digitalization into stroke care including telestroke, telerehabilitation, and videoconferencing is crucial to preserve the stroke “chain of survival”. SEAR countries are going through different phases of the pandemic and the third wave is about to occur in the coming months. WSO reinforces the importance of preserving the stroke systems of care in globally and in this region.

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