

Defining Aerosol Generating Procedures (AGPs) in the Emergency Department Setting

Patients should be triaged to the RED, ORANGE and GREEN ED zones as per the ED Triage Sieve.

Within these three zones PPE requirements and exact patient location also depend on whether AGPs are being performed or not.

This is a list of conditions people may be concerned are AGPs.

It is important you understand the requirements for standard, contact, droplet and airborne precautions (at the end of this document). AGP generating procedures in a patient with possible or confirmed COVID requires the ISO (T1 where not available) room and Airborne precautions.

Procedure	Is this an AGP?	Note	Reference
Clinical conditions / examination			
Coughing and sneezing	No	Surgical mask for patient	4
Vomiting	No		Consensus
Epistaxis	No	Nasal <u>packing</u> is considered an AGP	Consensus
Haemoptysis	No	Consider other diagnoses such as pulm TB and pulmonary varicella – may require ISO	
Haematemesis	No		Consensus
Lower GI bleed / melaena	No		Consensus
Oropharyngeal examination non touch	No		Consensus
Oropharyngeal examination with tongue depressor	Yes		1
Test of gag reflex	Yes		1
Management of Code Blacks especially where yelling and spitting is involved	Yes (in some cases)	See triage sieve	
ALS			
CPR compressions	No		4
Defibrillation	No		4
BVM ventilation	Yes		4
Intubation / LMA insertion	Yes		1,2,3,4
Suction	Yes		1,2,3,4
Airway Procedures			

Intubation / LMA insertion	Yes		1,2
Bag valve mask ventilation	Yes		2
Suction	Yes		1
Disconnecting vent circuit	Yes	Reduce risk by clamping tube	4
Tracheostomy or laryngostomy care	Yes		1
Surgical airway	Yes		ENT
Respiratory procedures			
Oro / nasopharyngeal swabs in those with pneumonia symptoms	Yes		2 and communication with infection control
Oro / nasopharyngeal swabs in those with fever and mild respiratory symptoms	No		2
Induced sputum collection	Yes		1
NIV – CPAP and BiPAP	Yes		1
High flow nasal oxygen (via humidifier)	Yes		1
Nasal prongs <4l/min	No		
Hudson mask <8L/min	No		
NRBM <15L/min	No		
Nebuliser	Yes		1
Use of spacer / MDIs	No		
Insertion of intercostal catheter	Yes		3
Needle chest aspiration	No		Consensus
ENT problems			
Packing the nose	Yes		Personal communication with SCGH ENT
Quinsy drainage	Yes		Personal communication with SCGH ENT
NG tube insertion	Yes		1
Spraying intranasal sprays	Yes		Personal communication with SCGH ENT
Gastrointestinal procedures			
NGT insertion	Yes		1

PR examination	No		
Flatus tube insertion / sigmoidoscopy	?	Await infection control response	
Manual faecal disimpaction	?	Await infection control response	

Standard precautions

The minimum infection prevention and control practices that must be used at all times for all patients in all situations.

- *Hand hygiene is considered one of the most important infection control measures*
- *Wear gloves (single-use non-sterile) when there is the potential for contact with blood, body fluids/substances, mucous membranes or non-intact skin.*
- *Wear an apron or gown to protect skin and prevent soiling of clothing during procedures and patient care activities that are likely to generate splashing or sprays of blood, body fluids, secretions or excretions, or cause soiling of clothing.*
- *Wear a mask and eye protection, or a face shield to protect mucous membranes of the eyes, nose and mouth during procedures, patient-care activities and cleaning procedures that are likely to generate splashes or sprays of blood, body fluids, secretions and excretions.*

Transmission based precautions

Contact precautions

Contact transmission (direct or indirect), e.g., viral gastroenteritis, Clostridium difficile, MRSA, scabies

Gloves and gown if touching patient or their surrounds

Add goggles / face shield and mask if procedures, patient-care activities and cleaning procedures that are likely to generate splashes or sprays of blood, body fluids, secretions and excretions.

Droplet precautions

Droplet transmission, e.g., influenza, pertussis (whooping cough), rubella

Mask (surgical).

Add gloves and gown if touching patient or their surrounds

Add goggles / face shield if procedures, patient-care activities and cleaning procedures that are likely to generate splashes or sprays of blood, body fluids, secretions and excretions.

Airborne precautions

Airborne transmission, e.g., pulmonary tuberculosis, chickenpox, measles

Mask (P2 or N95)

Add gloves and gown if touching patient or their surrounds

Add goggles / face shield if procedures, patient-care activities and cleaning procedures that are likely to generate splashes or sprays of blood, body fluids, secretions and excretions.

COVID is predominantly spread through **droplets** – small particles that settle after speaking / coughing within 1m or so.

It is also spread through **contact** – someone touches the place the droplets (or other body fluids) landed and then touches their mucous membranes and infection is spread.

Finally if there is an **aerosol** generating procedure it is possible COVID can be spread through tiny airborne particles that are capable of far floating further and for longer than droplets.

The aim of our infection control procedures is to minimise spread.

For most patients with who are not undergoing aerosol generating procedures (AGP) we use a combination of contact and droplet precautions and cohort patients. If AGPs are occurring ideally the patient should be placed in a negative pressure room (or enclosed room, or large 3 sided room with curtain and cohorted patient area) and clinical staff entering that room wear full PPE including an N95 fit-checked mask.

References

1. <https://scgophcg-healthpoint.hdwa.health.wa.gov.au/workingatscgh/COVID/Documents/Fact%20sheets/PPE%20Update%208%20May%202020%20.pdf>
2. https://healthpoint.hdwa.health.wa.gov.au/policies/Policies/NMAHS/SCGH/SCGH.IPCM.COVID_19_Policy.pdf
3. <https://ww2.health.wa.gov.au/About-us/Policy-frameworks/Public-Health/Mandatory-requirements/Communicable-Disease-Control/Infection-Prevention-and-Control/Identification-and-Use-of-Personal-Protective-Equipment-in-the-Clinical-Setting-COVID19-Policy>
4. <https://www.health.gov.au/sites/default/files/documents/2020/04/guidance-on-the-use-of-personal-protective-equipment-ppe-in-hospitals-during-the-covid-19-outbreak.pdf>
5. <https://www2.health.vic.gov.au/public-health/infectious-diseases/infection-control-guidelines/standard-additional-precautions>