

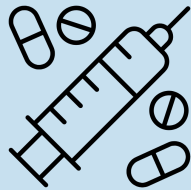
Multisystem Inflammatory Syndrome in Children (MIS-C)

Clinical Presentation

- Inflammatory illness associated with COVID-19 infection occurring up to 2-4 weeks post-infection
- Typically presents as refractory vasodilatory shock with fevers (for at least 4 days), GI complaints, and Kawasaki disease/toxic shock-like signs and symptoms; respiratory symptoms uncommon
- Progression of symptoms can be rapid
- SARS-CoV-2 IgG frequently positive

Commonly Used Treatments

- Inotropic support for shock
- Anti-inflammatory medications
 - Methylprednisolone of 1 mg/kg q12H (51-94%) or high-dose methylprednisolone 30 mg/kg/day
 - IVIg 2 g/kg (18-62%)
 - Anakinra 1 mg/kg/day (8-24%)
 - Prophylactic anticoagulation (65%)
 - High-dose aspirin (6%)
 - Consultations
 - Rheumatology, hematology, cardiology, infectious disease



Diagnostic Criteria (Must Have All 6)

- Age <21 years, AND
- Fever $>38^{\circ}\text{C}$ (100.4°F) for ≥ 24 hours, AND
- Laboratory markers of inflammation
 - Elevated CRP, ESR, fibrinogen, procalcitonin, D-dimer ferritin, LDH, IL-6, or neutrophils, AND
- Evidence of clinically severe illness requiring hospitalization with multisystem (≥ 2) organ involvement, including
 - Cardiac (eg, shock, elevated troponin, BNP, abnormal echocardiogram, arrhythmia)
 - Respiratory (eg, pneumonia, ARDS, pulmonary embolism)
 - Renal (eg, acute kidney injury or renal failure)
 - Gastrointestinal (eg, elevated bilirubin or elevated liver enzymes)
 - Neurologic (eg, stroke, aseptic meningitis, encephalopathy)
 - Dermatologic (eg, rash, dry cracked lips, strawberry tongue)
 - Fulfill full or partial criteria for typical or atypical Kawasaki disease
- Positive for current or recent SARS-CoV-2 infection by PCR, serology, or antigen testing or COVID-19 exposure within 4 weeks prior, AND
- No alternative plausible diagnoses

