MIS-C Case Definition (WHO/CDC)

RI DOH/CDC Reporting
1. Report MIS-C case to CDC and RIDOH
   a. Responsibility of primary team at discharge
   b. Place a Significant Event note in the EMR noting that RiDOH/CDC reporting has been completed
   a. Email completed form and patient facesheet to Karen Luther (Karen.Luther@health.ri.gov via lifespan email (using PHI in subject line) OR
   b. Send fax patient facesheet and completed form to: Karen Luther RN, MPH fax: 401-222-2488


Additional resources:
Fever ≥3 days AND 2 or more of the following:

- GI Symptoms (Diarrhea, abdominal pain, vomiting)
- Conjunctivitis or mucus membrane changes
- Extremity changes (hands &/or feet swelling, erythema)
- Neuro (headache, mental status changes)
- Cervical LAD
- Rash (oral, hands, feet)
- Respiratory symptoms

Think about alternative diagnosis (other viral illness, Pneumonia, UTI); Consider RPP2, CXR as indicated

Ill-appearing?

Yes

Initial Workup:
- CBC with diff
- CMP
- ESR
- CRP

CRP >3 mg/dL AND ESR >40 mm/hr ? OR ALC >1000 ? OR Plts < 150k ? OR Na >135 ? OR Elevated Cr ? OR Anemia for age ?

No

Send to ED for further evaluation

Yes

Send to ED for further evaluation

No

Home with f/u in 24-48 hours
**Multisystem Inflammatory Syndrome in Children (MIS-C) Pathway**

**Fever (>100.4°F) ≥ 24 hours**
*Typically high grade*

≥ 2 Clinical features
- Gastrointestinal (more common)
  - Diarrhea, abdominal pain, vomiting
- Dermatologic (more common)
  - Rash, desquamation, non-vesicular
- Conjunctivitis
  - Non-exudative conjunctivitis
- Oral Mucosal change
  - Erythema and cracked lips, erythema of oropharynx, strawberry tongue
- Extremity changes
  - Erythema and edema of hands and feet
- Lymphadenopathy
  - Cervical, unilateral, >1.5cm
- Neurologic
  - Headache, irritability, altered mental status
- Respiratory, Renal

*Epidemiologic Link to COVID*
- Positive test/exposure in the past >4 weeks

Consultations as indicated:
- Rheumatology
  - Unsure of MIS-C diagnosis
  - Refractory disease
- Infectious Disease
  - Unsure of MIS-C diagnosis
  - Fever workup
- Cardiology
  - Evaluate cardiac dysfunction
  - KD features
- Hematology/Oncology
  - Thromboprophylaxis

**Initial lab workup:**
- CBC w/diff, CMP, ESR, CRP, UA
- ↑ CRP >3 mg/dL or ESR >40 mm/hr AND at least 1:
  - ↓ Lymphopenia (<1000)
  - ↓ Thrombocytopenia (<150K)
  - ↓ Hyponatremia (<135)

**Extended workup:**
- ↑ D-dimer - EKG
- ↑ ferritin - Covid Ab
- ↑ fibrinogen - PT/INR
- ↑ BNP - Blood
- ↑ Troponin

- Reassuring exam & labs
- Close follow up with PCP

**Treat if symptoms and lab concerning for MIS-C [Multidisciplinary approach]**

**Admit to hospitalist team**
- PO Prednisolone/Prednisone 1mg/kg/dose 2XDay
- OR IV Methylprednisolone 1mg/kg/dose 2XD (max 30mg/dose)
- Duration: 5 days plus 10 days of Prednisolone
  - Day 1-5: 1mg/kg/2XD
  - Day 6-10: 0.5mg/kg/2XD
  - Day 11-15: 0.5mg/kg/dose 1XD

**Admit to hospitalist team/PICU**
- IV Methylprednisolone 1mg/kg/dose 2XD (max 30mg/dose)
- IVIG 2g/kg, ASA

**Mild MIS-C**
- Normal echo and no KD features
- Febrile but clinically well

**Moderate MIS-C**
- Cardiac dysfunction
- KD/incomplete KD features
- Hemodynamically stable

**Admit to PICU**
- IV Methylprednisolone 1mg/kg/dose 2XD (max 30mg/dose)
- IVIG 2g/kg, ASA

**Severe MIS-C**
- Shock/end organ dysfunction
- KD features/cardiac dysfunction

**Seek alternative diagnosis (viral illness, UTI, appendicitis)**

Further workup at the discretion of provider
- consider RP2, UA, CXR, abd US as indicated.

**Normal**
- Close follow up with PCP

**Abnormal**
- Reassuring exam & labs
- Treat if symptoms and lab concerning for MIS-C [Multidisciplinary approach]