Hematologics has been the recognized worldwide leader in detection of Myelodysplasia (MDS) by our unique use of ∆N:™ (Difference from Normal) Flow Cytometry. This unique validated Flow Cytometry Scoring System (FCSS) identifies and quantitates the abnormal changes in patients with cytopenias. By counting the number of abnormalities a risk score can be determined:

- **FCSS 0-1 Abnormalities:** Low Risk (Mild/Normal)
- **FCSS 2-3 Abnormalities:** Intermediate Risk (Moderate)
- **FCSS 4+ Abnormalities:** High Risk (Severe) with poor survival even when blasts are <5% (traditionally considered low risk)

This risk analysis by FCSS can help guide treatment decisions.

**Case Study – Diagnosis of Suspected MDS**

**Clinical History/Indications:** A bone marrow sample was submitted on a patient with a history of pancytopenia and an upper gastrointestinal bleed.

**Analysis/Conclusions:** ∆N:™ Flow Cytometry revealed abnormal myeloid antigen expression with no evidence of increased myeloblasts (0.3% myeloid progenitors detected), abnormal lymphoblasts, or lymphoma. The MDS FCSS score was 4, myelomonocytic dyspoiesis in a high-risk category.

Diagnosis: Consistent with refractory anemia with multilineage dysplasia (RCMD) demonstrating a FCSS poor risk score of 4 even in a specimen with only 0.3% myeloid progenitor cells. FCSS is correlated with IPSS and with outcome after hematopoietic stem cell transplantation.1


Hematologics provides a unique approach to testing in the areas of ∆N: Flow Cytometry, Molecular Genetics, Cytogenetics, Deep Sequencing, FISH and Micro-Array. Please visit our website, [www.hematologics.com](http://www.hematologics.com), for more information or call us at (800)860-0934.