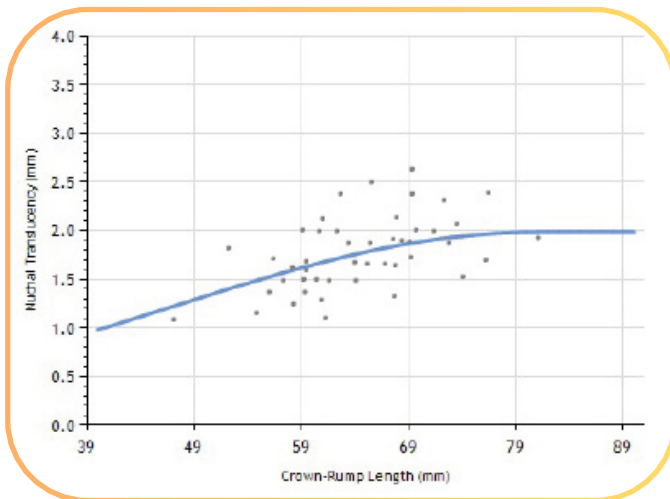


Tight Spread

When the sonographer-specific nt performance curve shows a tight spread, it indicates that the Operator may be ***inconsistently measuring the nt and/or crl*** or ***selecting nt measurements according to what is expected at a given crl.***

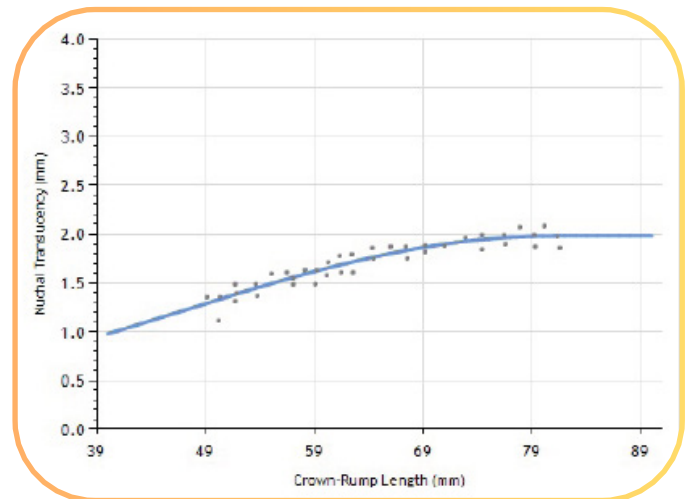
Spread refers to how closely the NT/CRL data points hug the Fetal Medicine Foundation (FMF-UK) reference curve. **A tight spread means that the majority of your data points are too close to the FMF curve and lack expected biological variation.**

Normal Spread



The data points cluster around the FMF curve, with some natural variation, as expected in a normal population.

Tight Spread



The majority of the data points are too close to the FMF reference curve, and show little variation.

➔ Why does it matter?

A Tight Spread can lead to inconsistent prenatal screening results.

➔ What to do about it?

The next step is to evaluate your scanning practice to determine **WHY** your data show a **tight spread**.

Tight Spread

Common reasons for a tight spread

- **Reliance on NT charts or built-in calculation packages** Viewing expected NT percentiles or charts during a scan may cause you to adjust your measurements to be closer to the expected NT value for a given gestational age. It is important that the documented NT reflects the actual NT measurement, not a value given by a standard chart.
- **Lower quality CRL and NT measurements** Obtaining high-quality CRL and NT measurements is critical to correcting a tight spread. Please review the resources on this page to ensure that your NT and CRL images are of the highest possible quality.
- **NT measurement recording errors** Always record the largest NT measurement from an image that meets the FMF image criteria.
- **Automated measurements** The use of built-in automated measurement functions can result in inaccurate measurements. When using these functions, verify that the measurements meet FMF criteria prior to submitting them.

NT **2.01 mm**
Pctl. **44.70 %**

Viewing the NT percentile as you scan can lead to subconscious pressures to “normalize” the NT measurement closer to the 50th percentile. This can be avoided by using regular calipers instead of a calc package.

→ Resources & recommendations

- Review the FMF Imaging Protocol and re-watch the NT Measurement sections of the [FMF 11-13 weeks scan course](#).
- This video by the [New Zealand Ministry of Health](#) provides excellent tips for consistently obtaining high-quality NT and CRL images.

→ Summary and next steps



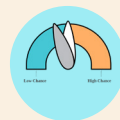
Step 1: Assess

Critically analyze your own NT and CRL images, to find reasons for your negative bias. Seeking feedback from colleagues may also be helpful.



Step 2: Review & implement

Review the Resources and Recommendations above, and implement changes to your NT and CRL scanning to correct errors contributing to a negative bias.



Step 3: Monitor

In six months, log in to your BORN account to view your NT performance curve, and monitor improvement in your bias.