Objective
To evaluate the effectiveness of a new screening for trisomies (T) 21, 18 and 13 through non-invasive prenatal test (NIPT), and to know the patient's opinion of available prenatal testing options.

Methods
Women attending for first routine pregnancy assessment (2016-2007), ≥18 years, with a singleton pregnancy were eligible. The conventional protocol classified women into 3 groups:
- High-risk (< 1:250): invasive test (IT) was offered.
- Intermediate-risk (1:250 to 1:1000): additional ultrasonographic markers were used to re-evaluate the risk group.
- Low-risk (< 1:1000); normal follow-up.

The new contingent screening introducing NIPT re-classified women into 3 groups:
- High-risk (< 1:10 and/or TN>3mm): IT was offered.
- Intermediate-risk (1:10 to 1:1500); NIPT was offered. If positive: IT; if negative: normal follow-up.
- Low-risk (< 1:1500); normal follow-up.

Sensitivity, specificity and false positive rate (FPR) of both screening strategies was compared. We analyzed the IT and NIPT rates and the patient’s opinion through an anonymous survey.

Results
Total of 2758 women and 476 NIPT.
Failure rate: 3%; 6.7±2.3 days for test.
NIPT screening detected all cases of aneuploidy and avoided 48.63% of IT.

After survey 383 (82%) patients preferred NIPT because there is no risk for fetus (n=357, 76.4%), and 239 (51.4%) patients thought NIPT requires short time.

Conclusion
New screening test for T21, T18 and T13 increases sensitivity and specificity compared with the conventional approach, reducing the IT rate and thus potential adverse events. Most of study patients at intermediate risk preferred the NIPT to avoid risk for fetus.