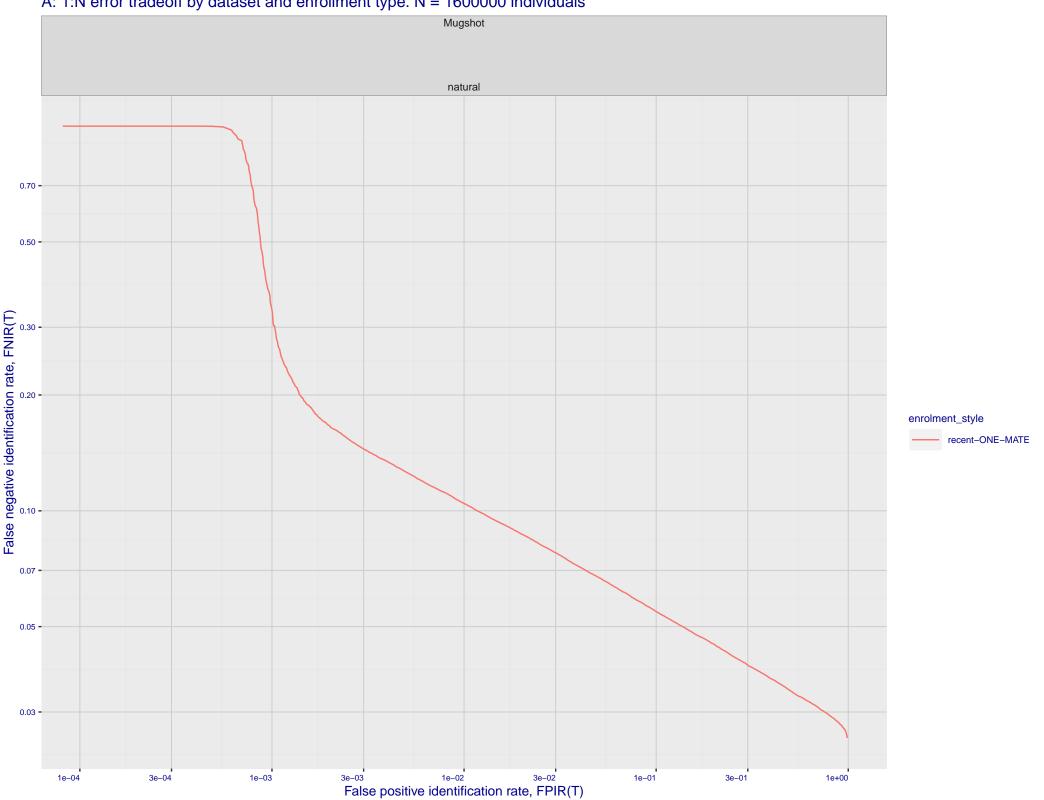
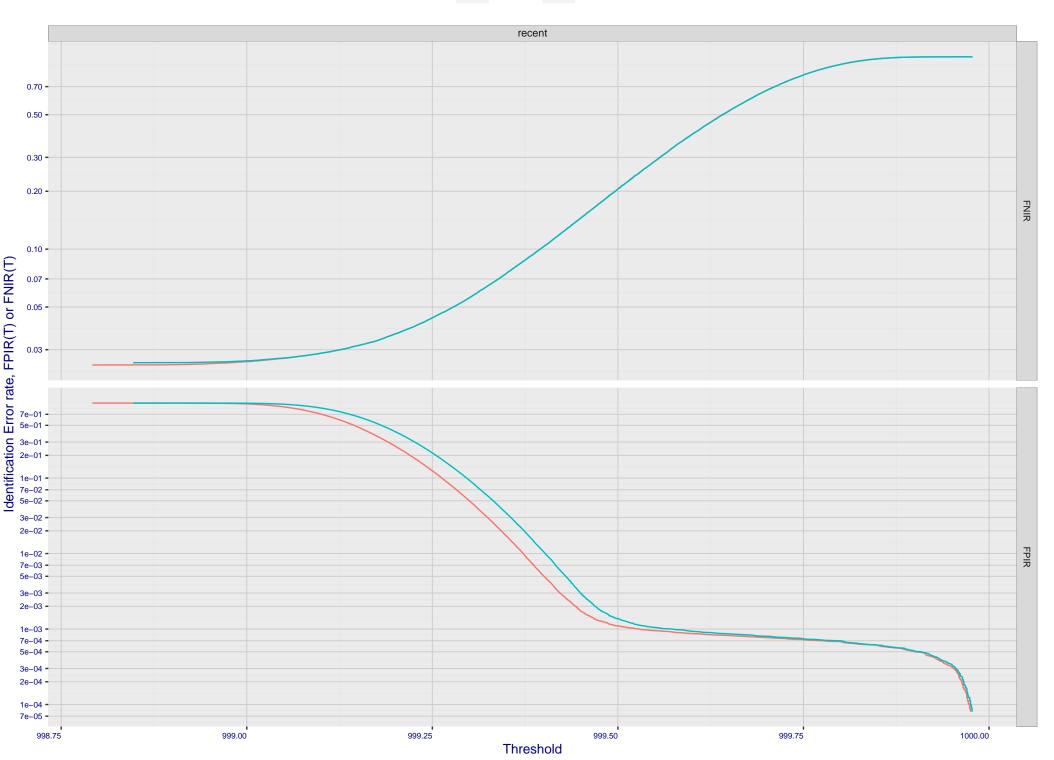
A: 1:N error tradeoff by dataset and enrollment type. N = 1600000 individuals Mugshot

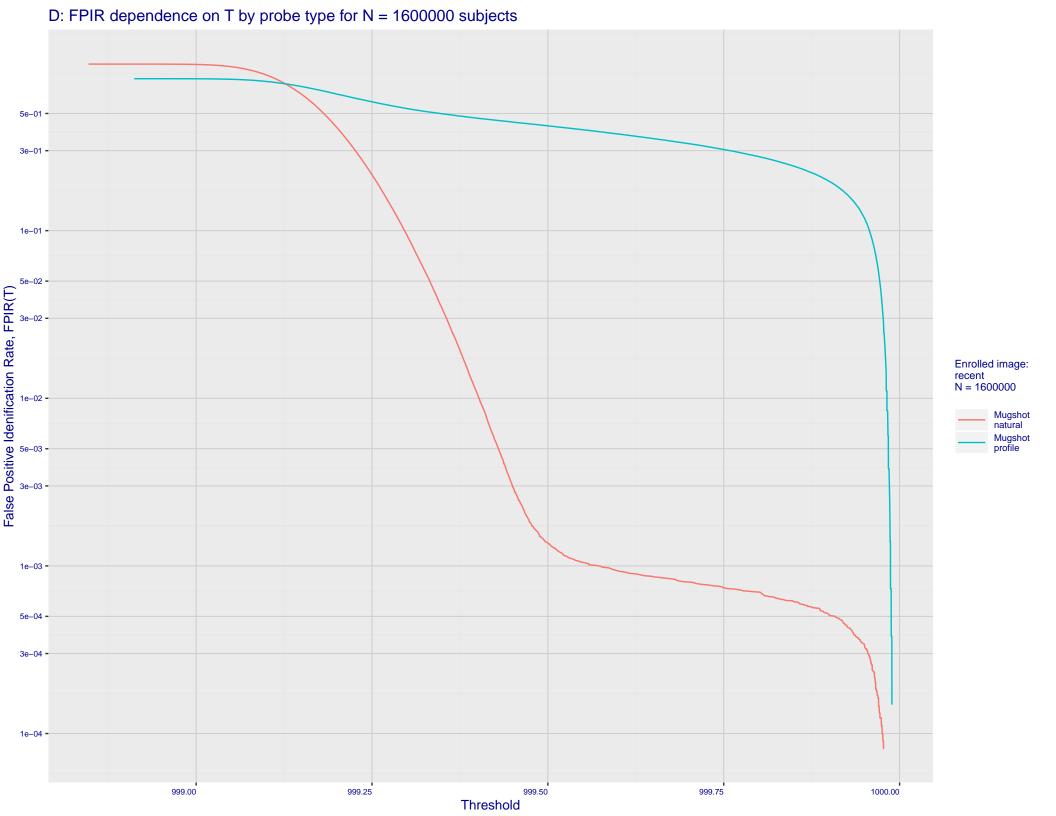


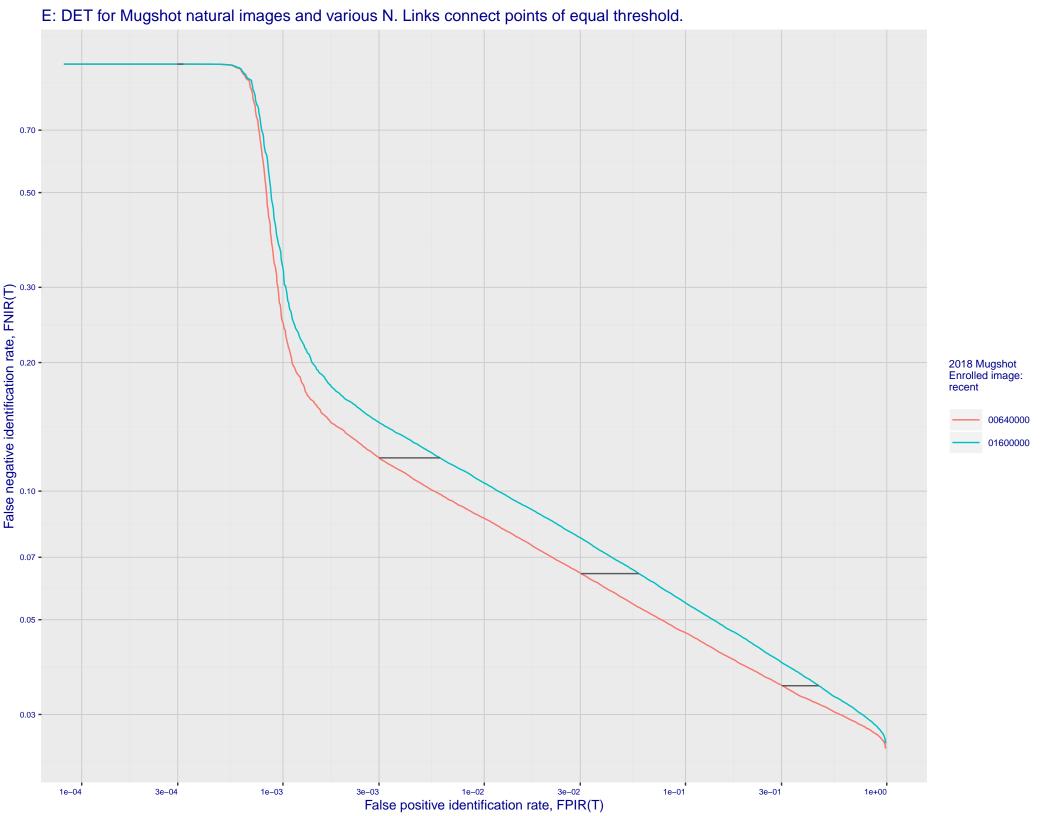
B: Dependence of error rates on T by number enrolled identities, N, for Mugshot natural images

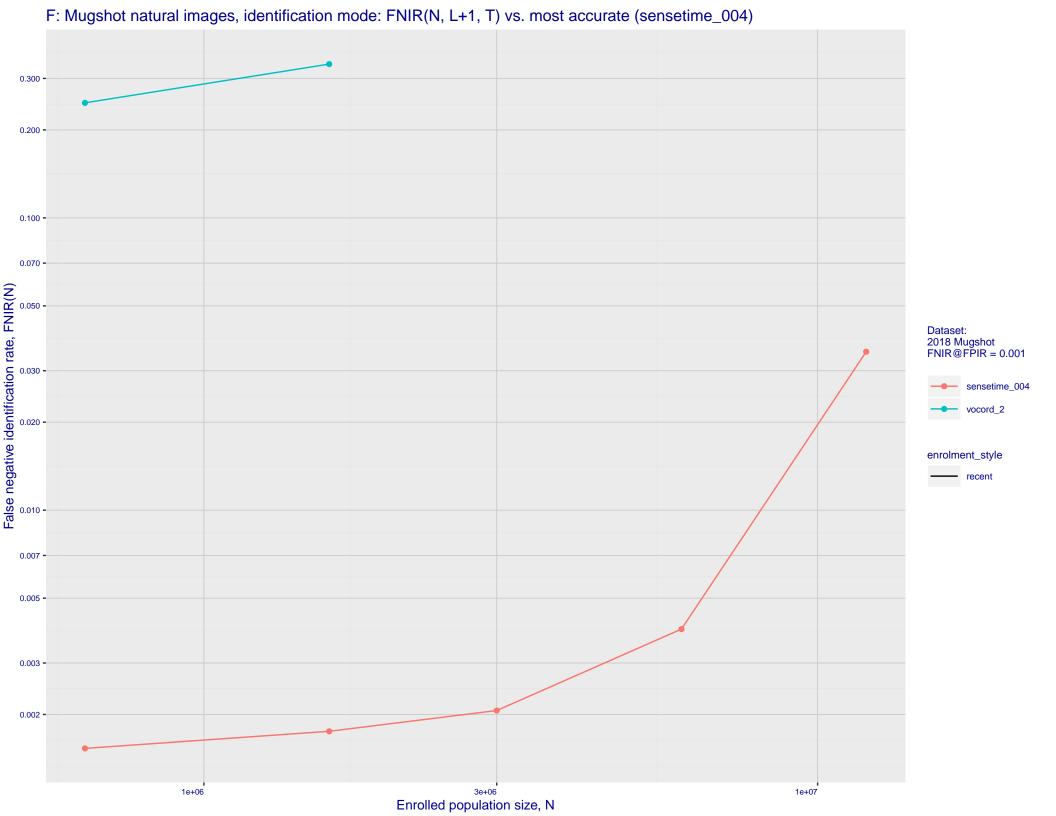




C: FPIR vs. Selectivity for mugshot images, N = 1600000 subjects enrolled with one recent mate 7e+01 5e+01 3e+01 -2e+01 -1e+01 -7e+00 -5e+00 -3e+00 -2e+00 -1e+00 -7e-01 -5e-01 -3e-01 -Selectivity, SEL(T) Selectivity, SEL(T) Se-02 - 5e-02 - 3e-02 - 3e-0 Enrolled images: recent N = 1600000Mugshot natural Mugshot profile 3e-02 2e-02 -1e-02 • 7e-03 -5e-03 -3e-03 -2e-03 1e-03 -7e-04 5e-04 -3e-04 -2e-04 -1e-04 -1e-02 1e-04 3e-04 1e-03 1e-01 3e-01 False Positive Idenification Rate, FPIR(T)







## G: Datasheet

Algorithm: vocord\_2

Developer: Vocord

Submission Date: 2018\_02\_16

Template size: 2048 bytes

Template time (2.5 percentile): 621 msec

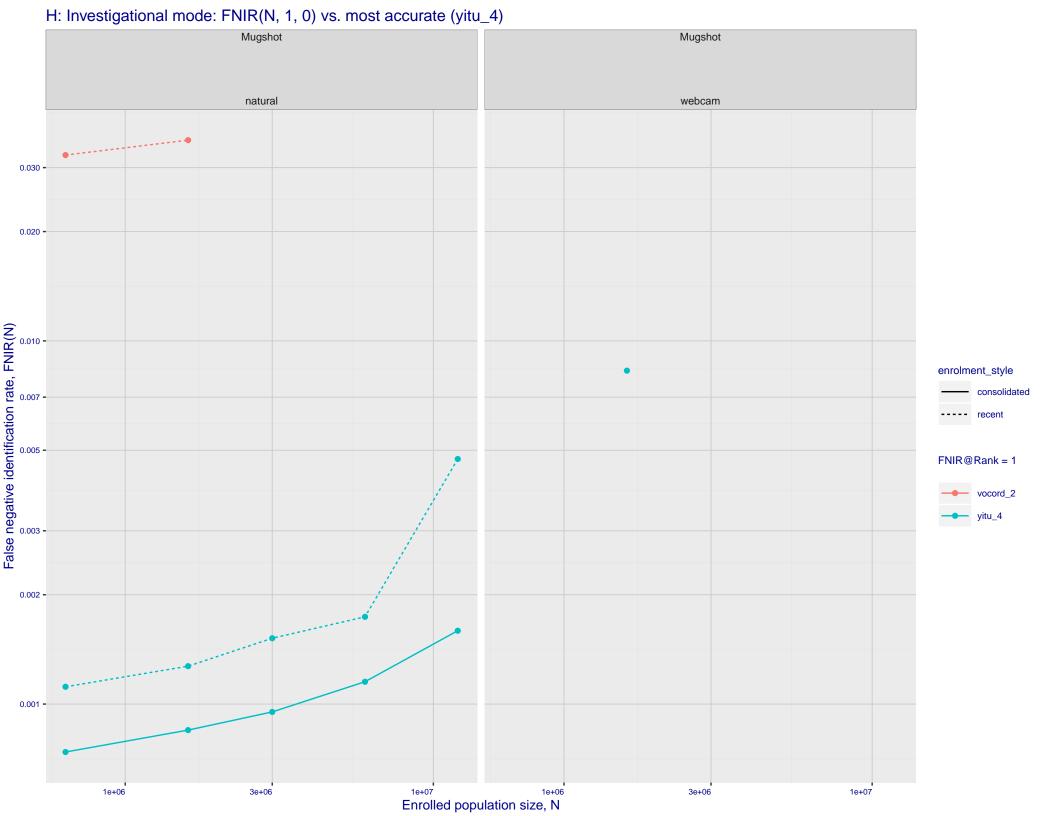
Template time (median): 631 msec

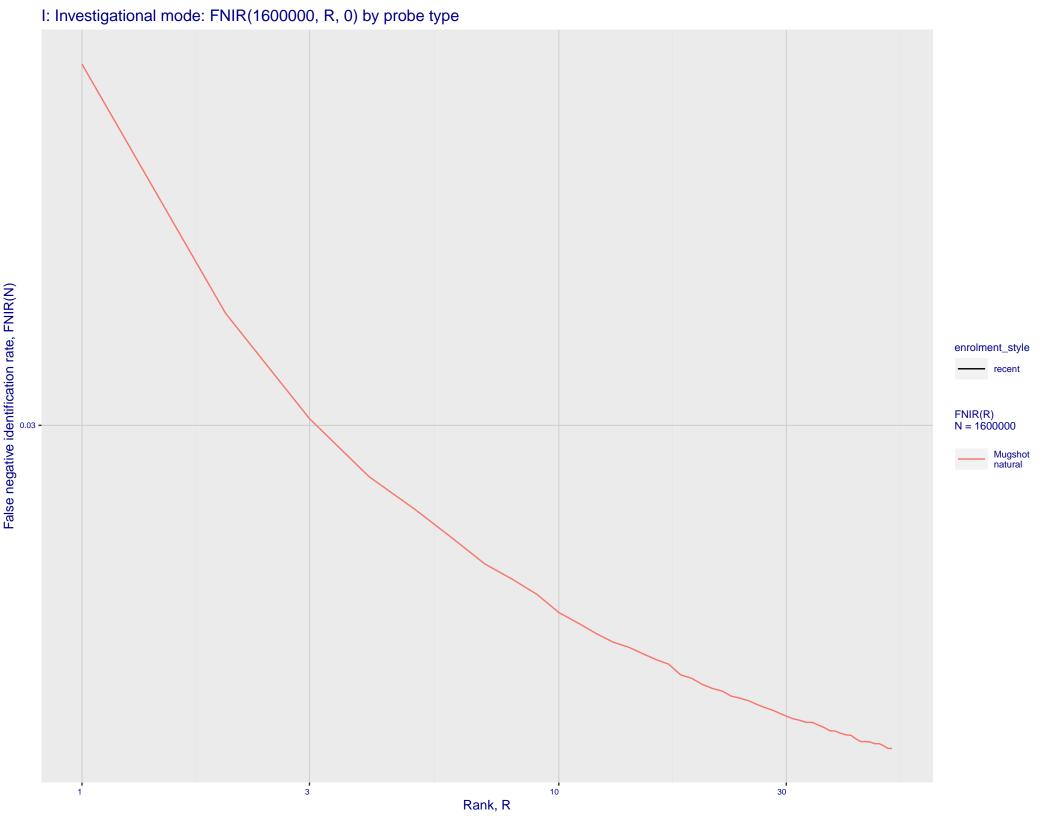
Template time (97.5 percentile): 662 msec

Frontal mugshot investigation rank 171 — FNIR(1600000, 0, 1) = 0.0357 vs. lowest 0.0010 from sensetime\_004 natural investigation rank 216 — FNIR(1600000, 0, 1) = 0.8901 vs. lowest 0.0492 from paravision\_005 natural investigation rank 216 — FNIR(1600000, 0, 1) = 0.8901 vs. lowest 0.0492 from paravision\_005

Frontal mugshot identification rank 186 — FNIR(1600000, T, L+1) = 0.3359 vs. lowest 0.0018 from sensetime\_004

natural identification rank 173 -- FNIR(1600000, T, L+1) = 0.9999 vs. lowest 0.1020 from sensetime\_004





Template duration; search duration vs. N. The blue and pink ribbon covers 95 percent of observed measurements. The template generation time is independent of N. The log and power–law models are fit to the first two (N,T) observations

