Mohammad A AlQudah* (alqudahm@northwood.edu), 4000 Whiting Dr, Midland, MI 48640. Chebyshev and Bernstein polynomials change of bases.

We construct multiple representations relative to different bases of Chebyshev polynomials. We provide a closed form for the matrix transformation of the generalized Chebyshev polynomial basis into Bernstein polynomial basis, and the matrix transformation of Bernstein polynomial basis into generalized Chebyshev polynomial basis. (Received January 19, 2015)