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**Nitya Mani\***, nityam@stanford.edu, and **Asra Ali**. *Shifted Convolution  $L$ -Series Values for Elliptic Curves*.

Using explicit constructions of the Weierstrass mock modular form and Eisenstein series coefficients, we obtain closed formulas for the generating functions of values of shifted convolution  $L$ -functions associated to certain elliptic curves. These identities provide a surprising relation between weight 2 newforms and shifted convolution  $L$ -values when the underlying elliptic curve has modular degree 1 with conductor  $N$  such that  $\text{genus}(X_0(N)) = 1$ . (Received August 23, 2018)