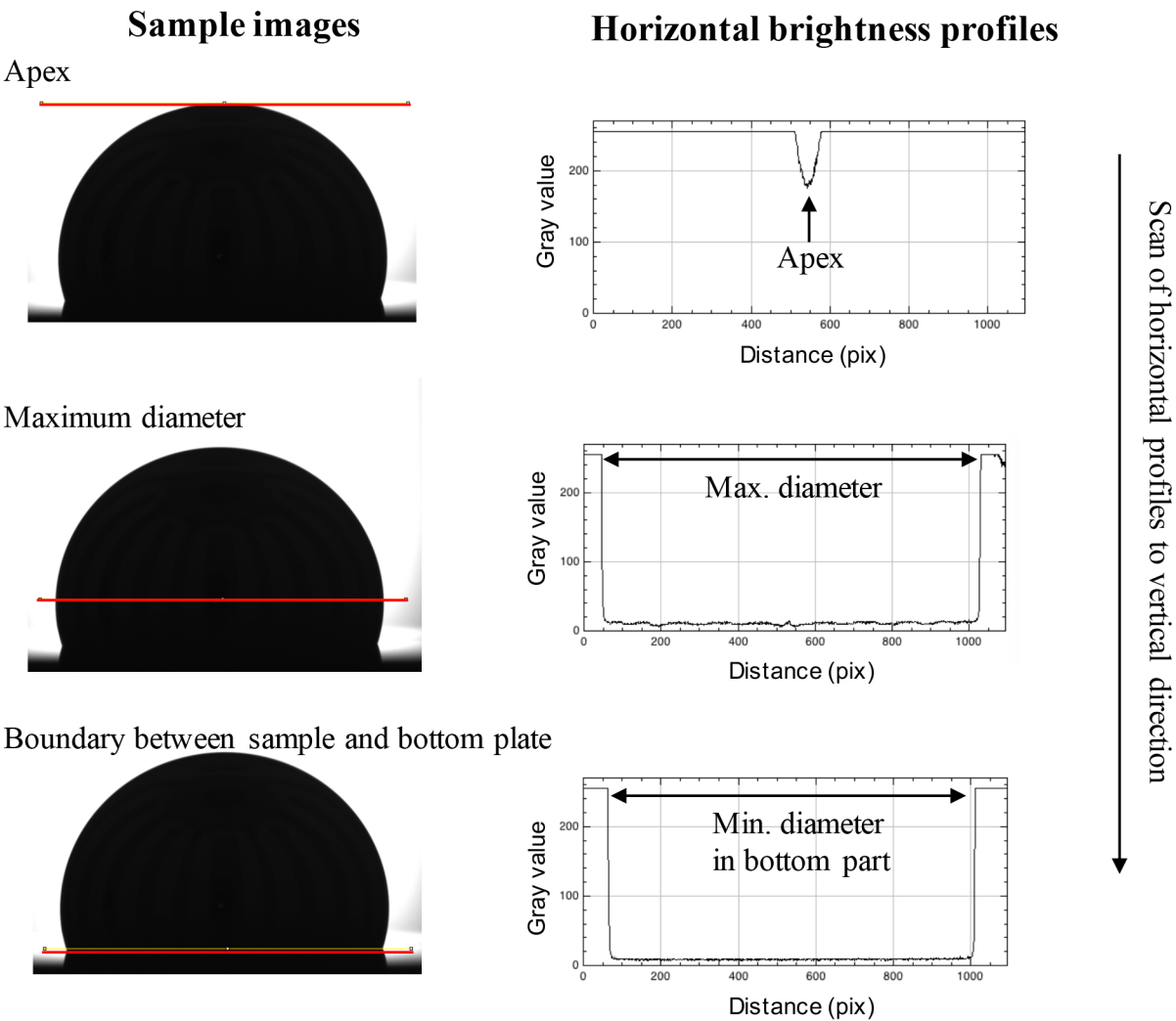
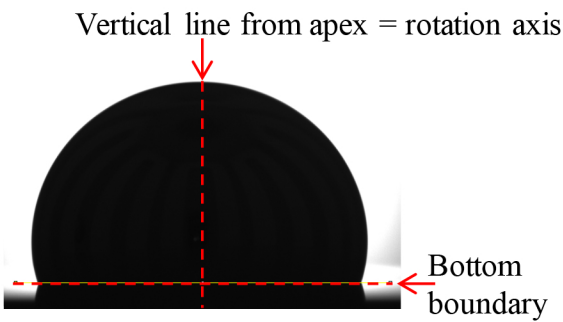


(i) Scan of horizontal brightness profiles to vertical direction

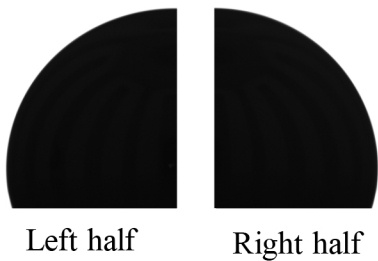


(ii) Determination of rotation axis



American Mineralogist: July 2021 Online Materials AM-21-77509
KAMIYA ET AL.: EFFECT OF TEMPERATURE ON THE DENSITY OF METALS

(iii) Sample image cut at rotation axis



Area and gravity center of each half image is obtained from image analysis. Then, volume is calculated using these data with Pappu's theorem.

Figure S2. Volume analysis procedure of liquid sample. (i) Procedure of vertical scan of horizontal brightness profiles. Left is sample image and right is horizontal brightness profile at red horizontal line shown in left image. (ii) Determination of rotation axis. (iii) Sample image cut at rotation axis.