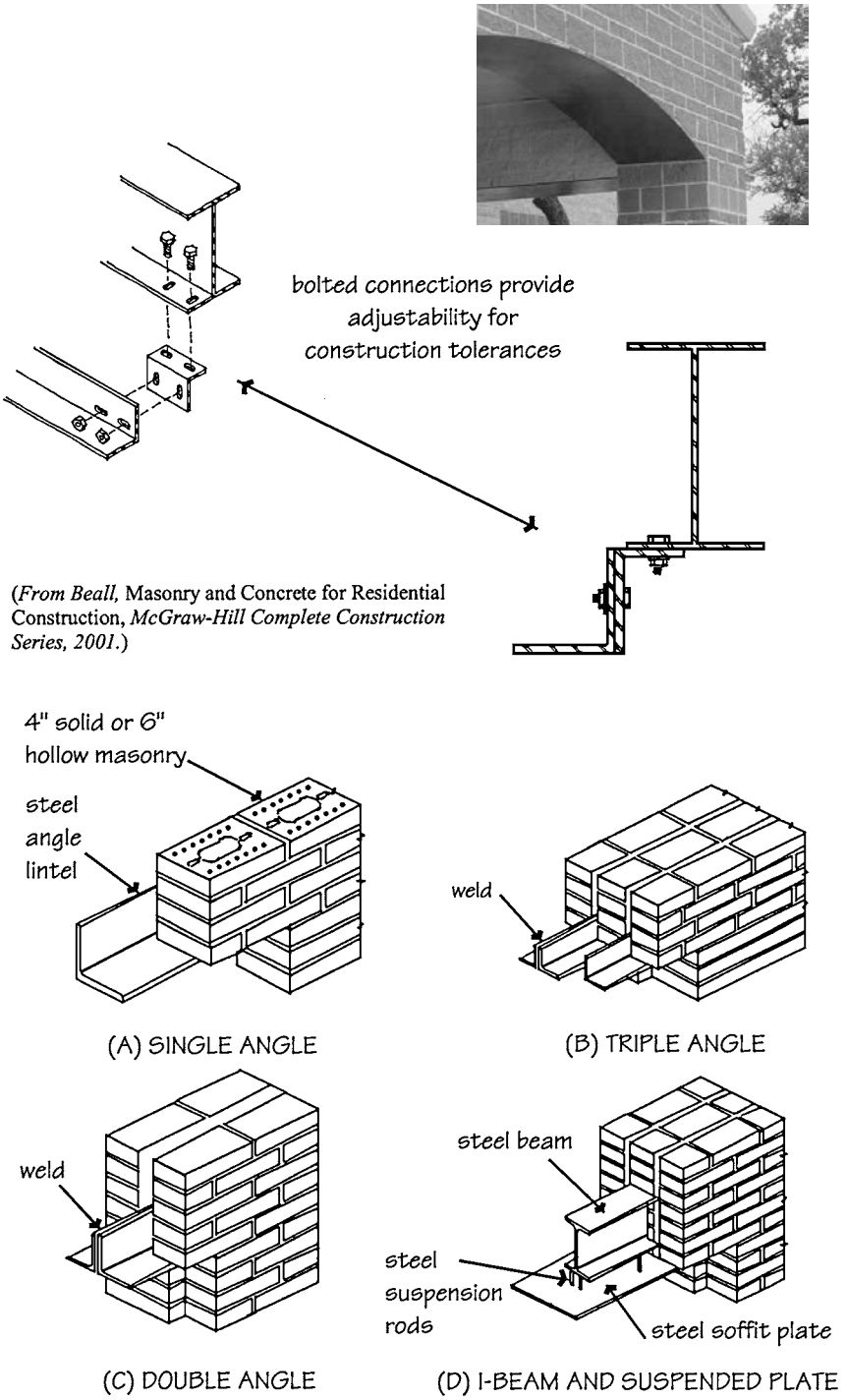

Figure 11-8 Simple, compound, and curved steel lintels.

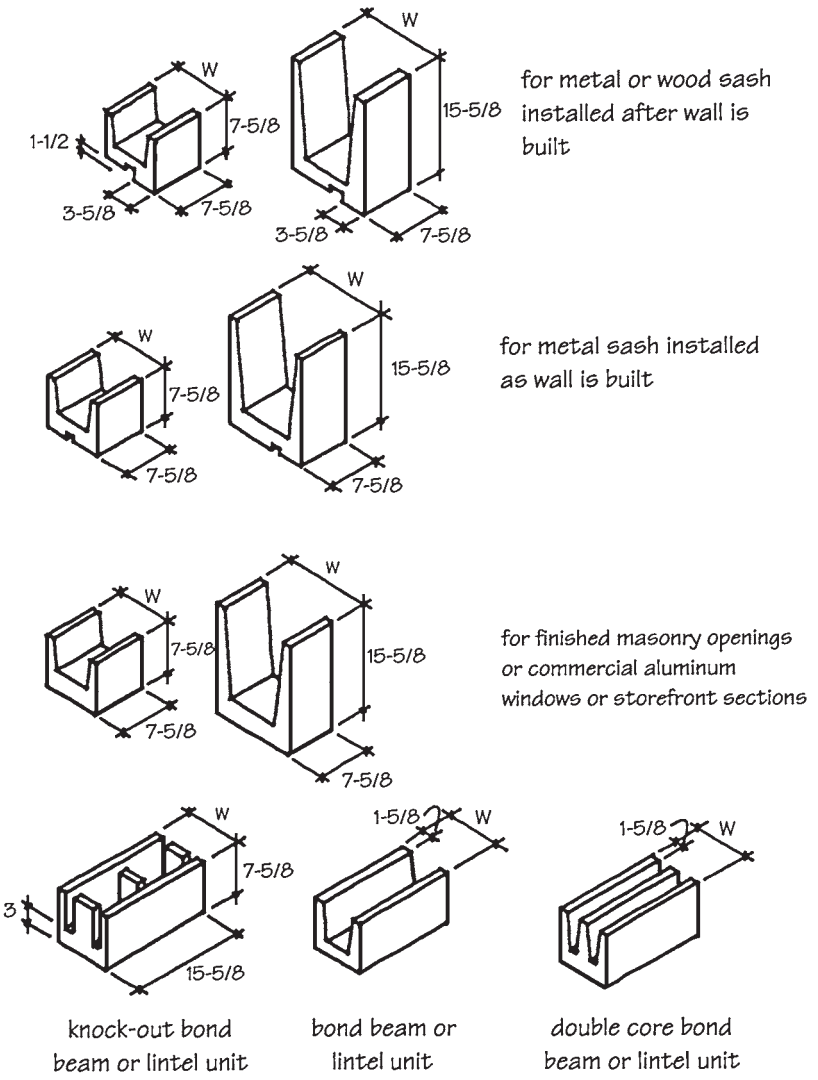

Figure 11-9 Concrete masonry lintel units.

Units used for lintel construction should comply with the requirements of ASTM C90, *Standard Specification for Loadbearing Concrete Masonry Units,* and should have a minimum compressive strength adequate to provide the masonry compressive strength (f'_m) used in the design. Mortar should be equal to that used in constructing the wall and should meet the minimum requirements of ASTM C270, Type N. Grout for embedment of reinforcing steel should comply with ASTM C476, and maximum aggregate size is dependent on the size of the grout space (see Chapter 6). The first course of masonry above the lintel should be laid with full mortar bedding so that the cross webs as well as the face shells of the units bear on the lintel and reduce the shear stress between the grout-filled core and the face shells.

A minimum end bearing of 8 in. is recommended for reinforced CMU lintels with relatively modest spans. For longer spans or heavy loads, bearing stresses should be calculated to ensure that the allowable compressive stress of the masonry is not exceeded. High stress concentrations may require the