

**EXHIBIT 344.1** Minimum support required for RMC.

**TABLE 344.30(B)** Supports for Rigid Metal Conduit

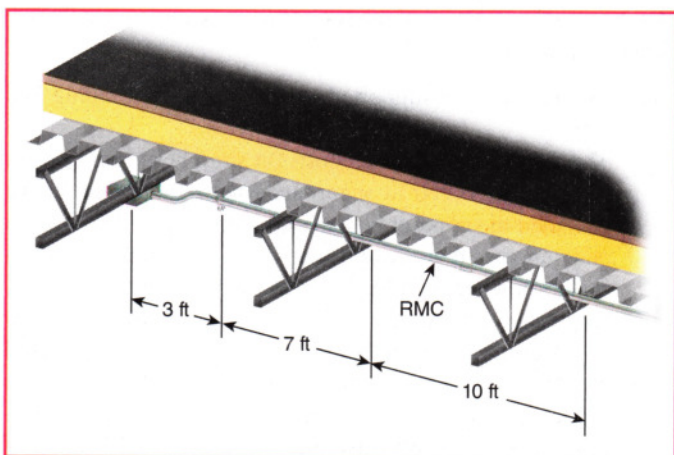
Conduit Size		Maximum Distance Between Rigid Metal Conduit Supports	
Metric Designator	Trade Size	m	ft
16–21	1/2–3/4	3.0	10
27	1	3.7	12
35–41	1 1/4–1 1/2	4.3	14
53–63	2–2 1/2	4.9	16
78 and larger	3 and larger	6.1	20

- (4) Horizontal runs of RMC supported by openings through framing members at intervals not exceeding 3 m (10 ft) and securely fastened within 900 mm (3 ft) of termination points shall be permitted.

Lengths of RMC are permitted to be supported (but not necessarily secured) by framing members at 10-foot intervals, provided the RMC is secured and supported at least 3 feet from the box or enclosure. Installations where the RMC is installed through bar joists are just one example, as illustrated in Exhibit 344.2.

### 344.42 Couplings and Connectors.

**(A) Threadless.** Threadless couplings and connectors used with conduit shall be made tight. Where buried in masonry or concrete,



**EXHIBIT 344.2** An example of RMC supported by framing members and securely fastened 3 feet from the box.

they shall be the concrete tight type. Where installed in wet locations, they shall comply with 314.15. Threadless couplings and connectors shall not be used on threaded conduit ends unless listed for the purpose.

Exhibit 344.3 illustrates two different conduit fittings: a threadless conduit coupling and a threadless conduit connector. Threadless fittings might be suitable for other applications, such as in raintight or concretetight applications, provided the product itself, or the product packaging, is marked as such.

In general, threadless fittings are not intended for use over threads, because the fitting will not seat properly. The threaded end of the conduit should be cut off and the conduit reamed before installation.

Exhibit 344.4 illustrates a three-piece threaded coupling (the electrical equivalent of a pipe union), which is used to join two lengths of conduit where turning either length is impossible, such as in underground or concrete slab construction. Another fitting for joining conduit is a bolted split coupling.

**(B) Running Threads.** Running threads shall not be used on conduit for connection at couplings.



**EXHIBIT 344.3** An example of RMC threadless connector (bottom) and a threadless coupling (top). (Courtesy of Eaton, Crouse-Hinds Division)