

# ISMC channel weight chart

Weight per metre, dimensions and section properties of ISMC medium weight channels to IS 808:2021, including the heavier wagon sections.

| Section                     | h (mm) | b (mm) | tw (mm) | tf (mm) | kg/m  | lb/ft | A (cm <sup>2</sup> ) | Ix (cm <sup>4</sup> ) | Iy (cm <sup>4</sup> ) | Zx (cm <sup>3</sup> ) | 1989 kg/m | 1964 kg/m |
|-----------------------------|--------|--------|---------|---------|-------|-------|----------------------|-----------------------|-----------------------|-----------------------|-----------|-----------|
| ISMC 75                     | 75     | 40     | 4.8     | 7.5     | 7.14  | 4.80  | 9.08                 | 78.20                 | 12.70                 | 20.90                 | 7.14      | 6.8       |
| ISMC 100                    | 100    | 50     | 5       | 7.7     | 9.56  | 6.42  | 12.10                | 191                   | 26.30                 | 38.40                 | 9.56      | 9.2       |
| ISMC 125                    | 125    | 65     | 5.3     | 8.2     | 13.10 | 8.80  | 16.60                | 424                   | 60.30                 | 67.90                 | 13.10     | 12.7      |
| ISMC 125 (heavy, 13.7 kg/m) | 125    | 66     | 6       | 8.1     | 13.70 | 9.21  | 17.40                | 433                   | 63.70                 | 69.40                 | —         | —         |
| ISMC 150                    | 150    | 75     | 5.7     | 9       | 16.80 | 11.29 | 21.30                | 786                   | 102                   | 104                   | 16.80     | 16.4      |
| ISMC 150 (heavy, 17.7 kg/m) | 150    | 76     | 6.5     | 9       | 17.70 | 11.89 | 22.50                | 810                   | 108                   | 108                   | —         | —         |
| ISMC 175                    | 175    | 75     | 6       | 10.2    | 19.60 | 13.17 | 24.80                | 1,230                 | 120                   | 141                   | 19.60     | 19.1      |
| ISMC 175 (heavy, 21.4 kg/m) | 175    | 76     | 7.5     | 10.2    | 21.40 | 14.38 | 27.30                | 1,290                 | 130                   | 147                   | —         | —         |
| ISMC 200                    | 200    | 75     | 6.2     | 11.4    | 22.30 | 14.98 | 28.40                | 1,820                 | 139                   | 182                   | 22.30     | 22.1      |
| ISMC 200 (heavy, 24.3 kg/m) | 200    | 76     | 7.5     | 11.4    | 24.30 | 16.33 | 30.90                | 1,900                 | 149                   | 190                   | —         | —         |
| ISMC 225                    | 225    | 80     | 6.5     | 12.4    | 26.10 | 17.54 | 33.20                | 2,700                 | 185                   | 240                   | 26.10     | 25.9      |
| ISMC 250                    | 250    | 80     | 7.2     | 14.1    | 30.60 | 20.56 | 38.90                | 3,820                 | 218                   | 306                   | 30.60     | 30.4      |
| ISMC 225 (heavy, 30.7 kg/m) | 225    | 82     | 9       | 12.4    | 30.70 | 20.63 | 38.70                | 2,920                 | 210                   | 260                   | —         | —         |
| ISMC 250 (heavy, 34.2 kg/m) | 250    | 82     | 9       | 14.1    | 34.20 | 22.98 | 43.40                | 4,060                 | 242                   | 325                   | —         | —         |
| ISMC 300                    | 300    | 90     | 7.8     | 13.6    | 36.30 | 24.39 | 46.20                | 6,400                 | 311                   | 427                   | 36.30     | 35.8      |
| ISMC 250 (heavy, 38.1 kg/m) | 250    | 83     | 11      | 14.1    | 38.10 | 25.60 | 48.10                | 4,280                 | 258                   | 342                   | —         | —         |
| ISMC 300 (heavy, 41.5 kg/m) | 300    | 92     | 10      | 13.6    | 41.50 | 27.89 | 52.70                | 6,880                 | 344                   | 458                   | —         | —         |
| ISMC 350                    | 350    | 100    | 8.3     | 13.5    | 42.70 | 28.69 | 54.30                | 10,000                | 429                   | 575                   | 42.70     | 42.1      |
| ISMC 300 (heavy, 46.2 kg/m) | 300    | 93     | 12      | 13.6    | 46.20 | 31.04 | 58.40                | 7,260                 | 363                   | 484                   | —         | —         |
| ISMC 400                    | 400    | 100    | 8.8     | 15.3    | 50.10 | 33.67 | 63.70                | 15,100                | 504                   | 758                   | 50.10     | 49.4      |

Source: IS 808:2021; earlier weights from IS 808:1989 and SP 6(1):1964, as published by Public.Resource.Org. Nominal values for estimating; verify with the producer. [steelweight-calculator.com](http://steelweight-calculator.com)