

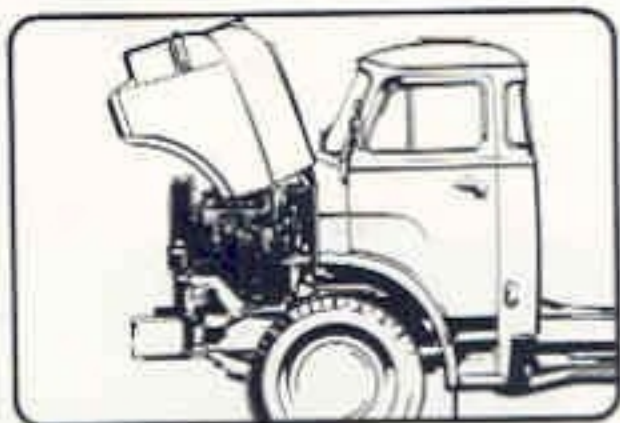
# M·A·N

**19.230 DH-TM**  
**19.230 DHA-TM**

Semi-Forward Control - 3-Axled Chassis

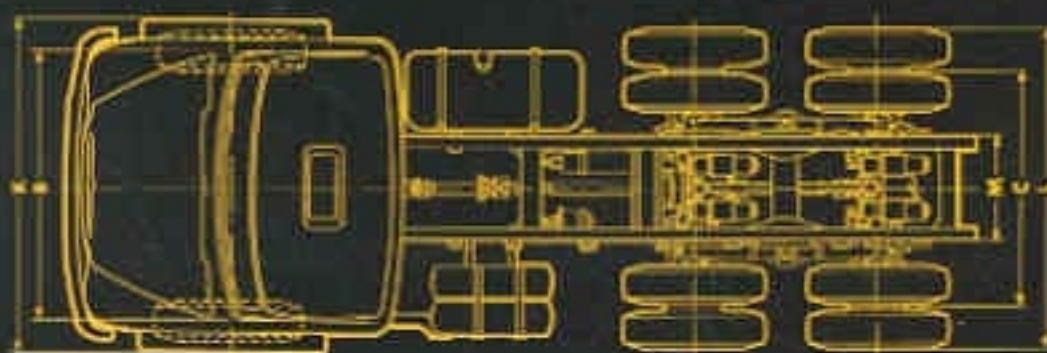
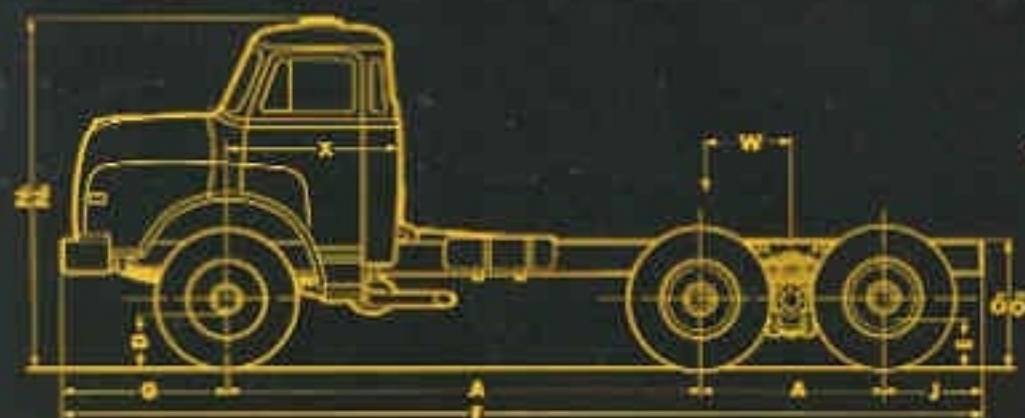
Easy access to engine through extra-wide  
winged bonnet

254 HP (SAE) M.A.N.-HM-Engine  
Permissible g.v.w. 26 tons  
Permissible g.c.w. 38 tons



# M·A·N

## 19.230 DH-TM 19.230 DHA-TM



### DIMENSIONS in mm.

|                                       |               |               |               |               |
|---------------------------------------|---------------|---------------|---------------|---------------|
| A - Wheelbase                         | 3425<br>+1200 | 3650<br>+1200 | 3425<br>+1200 | 3600<br>+1200 |
| B - Track, front                      | 2050          | 2050          | 2050          | 2050          |
| C - Track, rear                       | 1281          | 1302          | 1301          | 1311          |
| D - Ground clearance, front, approx.  | 452           | 461           | 353           | 351           |
| E - Ground clearance, rear, approx.   | 330           | 323           | 323           | 323           |
| F - Minimum track circle dia. in m.   | 14.6          | 15.4          | 14.1          | 13.8          |
| G - Minimum turning circle dia. in m. | 14.1          | 13.2          | 13.7          | 13.1          |
| H - Overall length                    | 6750          | 7172          | 6750          | 7170          |
| I - Front vehicle overhang            | 1235          | 1235          | 1235          | 1235          |

|  |      |      |      |      |
|--|------|------|------|------|
| J - Rear frame overhang  | 735  | 735  | 735  | 735  |
| K - Width over cab   | 2450 | 2450 | 2450 | 2450 |
| L - Width over outer rear tyres  | 2395 | 2395 | 2395 | 2395 |
| M - Weight of frame  | 360  | 360  | 360  | 360  |
| N - Weight over cab, unloaded, approx.   | 2725 | 2725 | 2725 | 2725 |
| O - Height over cab, loaded, approx.   | 2125 | 2125 | 2125 | 2125 |
| P - Height of frame, unloaded, approx.   | 1012 | 1012 | 1012 | 1012 |
| Q - Height of frame, loaded, approx.   | 962  | 962  | 962  | 962  |
| W - Centre of gravity for body and payload (measured from centre of rear axle) | -    | -    | -    | -    |
| X - Distance from axle to back of cab  | 1380 | 1380 | 1380 | 1380 |

Y - Measured above centre of rear axle.

### WEIGHTS in kgs.

|  |       |       |       |       |
|--|-------|-------|-------|-------|
| Chassis weight with cab, without driver, tools and spare wheel | 7130  | 7130  | 7140  | 7215  |
| Chassis carrying capacity                                      | 18850 | 18850 | 18420 | 18300 |

|                                      |           |           |           |           |
|--------------------------------------|-----------|-----------|-----------|-----------|
| Permissible gross vehicle weight     | 25000     | 25000     | 25000     | 25000     |
| Permissible axle load, front         | 6000      | 6000      | 6100      | 6000      |
| Permissible axle load, rear          | 2 x 10000 | 2 x 10000 | 2 x 10000 | 2 x 10000 |
| Permissible gross combination weight | 38000     | 38000     | 38000     | 38000     |

Chassis carrying capacity is approx. 50 kgs. (less for vehicles with splitter disc).

### SPEEDS, RATIOS AND CLIMBING ABILITY (For gears without splitter box - standard)

| Gross vehicle weight     | kgs. (lb.)      |       | 25000 |                | 25000 |      |  |       |                |       |                |      |                |      |       |
|--------------------------|-----------------|-------|-------|----------------|-------|------|--|-------|----------------|-------|----------------|------|----------------|------|-------|
|                          |                 |       | 13000 |                | 13000 |      |  |       |                |       |                |      |                |      |       |
| Gross tractor weight     | kgs. (lb.)      |       | 13000 |                | 13000 |      |  |       |                |       |                |      |                |      |       |
| Gross combination weight | kgs. (lb.)      |       | 38000 |                | 38000 |      |  |       |                |       |                |      |                |      |       |
| Gearbox ratios           | Speed in k.p.h. |       |       |                |       |      | Climbing ability % up to 300 m. above R.L. |       |                |       |                |      |                |      |       |
|                          | at max. r.p.m.  |       |       | at max. torque |       |      | at max. r.p.m.                             |       | at max. torque |       | at max. r.p.m. |      | at max. torque |      |       |
| Rear axle ratios 6x4     | 6.25            | 7.22  | 8.11  | 6.25           | 7.22  | 8.11 | 6.25                                       | 7.22  | 8.11           | 6.25  | 7.22           | 8.11 | 6.25           | 7.22 | 8.11  |
| 1st gear                 | 9.00            | 7.8   | 6.8   | 6.1            | 5.8   | 4.9  | 4.3  | 31.2% | 34.2%          | 42.2% | 25.5           | 24.2 | 27.3           | 20.3 | 18.8  |
| 2nd gear                 | 5.98            | 13.8  | 11.3  | 10.6           | 9.7   | 8.4  | 7.2  | 17.2  | 19.8           | 22.5  | 11.2           | 12.1 | 13.8           | 11.2 | 12.8  |
| 3rd gear                 | 3.14            | 22.7  | 18.7  | 17.5           | 15.9  | 13.8 | 12.2                                       | 9.9   | 11.5           | 13.0  | 6.4            | 7.5  | 8.8            | 11.7 | 13.8  |
| 4th gear                 | 1.94            | 35.7  | 31.8  | 28.4           | 26.8  | 23.3 | 20.0                                       | 6.7   | 8.7            | 7.9   | 3.5            | 4.2  | 4.3            | 5.8  | 6.0   |
| 5th gear                 | 1.34            | 52.2  | 46.1  | 41.2           | 37.2  | 32.4 | 28.8                                       | 3.6   | 4.2            | 4.8   | 2.1            | 2.5  | 3.1            | 4.4  | 3.1   |
| 6th gear                 | 1.00            | 71.3% | 61.8% | 55.0%          | 50.2  | 43.4 | 38.5                                       | 2.4   | 2.8            | 3.4   | 1.2            | 1.7  | 2.0            | 3.0  | 2.8   |
| Reverse                  | 9.40            | 6.4   | 7.2   | 6.5            | 5.8   | 5.1  | 4.8  | 26.1  | 34.2%          | 35.2% | 13.1           | 12.4 | 15.4           | 11.2 | 12.4  |
| Rear axle ratios 6x2     | 6.25            | 7.22  | 8.11  | 7.22           | 6.25  | 7.22 | 6.25                                       | 7.22  | 6.25           | 7.22  | 6.25           | 7.22 | 6.25           | 7.22 | 7.22  |
| 1st gear                 | 9.00            | 7.8   | 6.8   | 6.1            | 5.8   | 4.9  | 4.3  | 31.2% | 34.2%          | 42.2% | 25.5           | 24.2 | 27.3%          | 20.3 | 18.8% |
| 2nd gear                 | 5.98            | 13.8  | 11.3  | 10.6           | 9.7   | 8.4  | 7.2  | 17.2  | 19.8           | 22.5% | 11.2           | 12.1 | 13.8%          | 11.2 | 12.8% |
| 3rd gear                 | 3.14            | 22.7  | 18.7  | 17.5           | 15.9  | 13.8 | 12.2                                       | 9.9   | 11.5           | 13.0% | 6.4            | 7.5  | 8.8%           | 11.7 | 13.8% |
| 4th gear                 | 1.94            | 35.7  | 31.8  | 28.4           | 26.8  | 23.3 | 20.0                                       | 6.7   | 8.7            | 7.9%  | 3.5            | 4.2  | 4.3%           | 5.8  | 6.0%  |
| 5th gear                 | 1.34            | 52.2  | 46.1  | 41.2           | 37.2  | 32.4 | 28.8                                       | 3.6   | 4.2            | 4.8%  | 2.1            | 2.5  | 3.1%           | 4.4  | 3.1%  |
| 6th gear                 | 1.00            | 71.3% | 61.8% | 55.0%          | 50.2  | 43.4 | 38.5                                       | 2.4   | 2.8            | 3.4%  | 1.2            | 1.7  | 2.0%           | 3.0  | 2.8%  |
| Reverse                  | 9.40            | 6.4   | 7.2   | 6.5            | 5.8   | 5.1  | 4.8  | 26.1  | 34.2%          | 35.2% | 13.1           | 12.4 | 15.4%          | 11.2 | 12.4% |

1) Only applicable to axle vehicle at rated engine speed. - 2) Maximum probability as specified by manufacturer 30%. - H - high range, R - low range. - Subject to modification without previous notice.





**M·A·N**

Model 19 230 DH-TM/DHA-TM