


The Timken Company

4500 Mt Pleasant St. NW

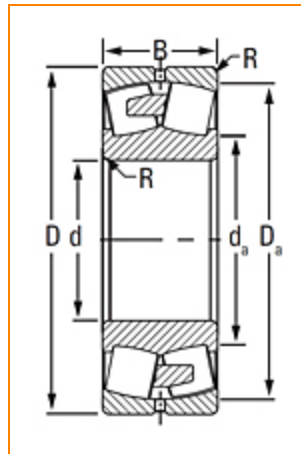
N. Canton, OH 44720

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Part Number 23124EMW33, Spherical Roller Bearings - Brass Cage

Spherical bearings are designed to manage high radial loads even when misalignment, poor lubrication, contamination, extreme speeds or critical application stresses are present.



[Specifications](#) | [Dimensions](#) | [Abutment and Fillet Dimensions](#) | [Basic Load Ratings](#) | [Factors](#)

Specifications

Design Unit	Metric
d - Bore	120 mm
Cage Type	EM
Cage Material	Brass
Superseded Part	23124YMW33

Dimensions

D - Outer Diameter	200 mm 7.874 in
 - Inner Ring Width	62 mm 2.4409 in

B - Outer Ring Width

62 mm
2.4409 in

Abutment and Fillet Dimensions**R - Inner Ring "To Clear" Radius¹**

2 mm
0.080 in

r - Outer Ring "To Clear" Radius²

2 mm
0.08 in

da - Inner Ring Backing Diameter

138 mm
5.4000 in

Da - Outer Ring Backing Diameter

182 mm
7.200 in

Basic Load Ratings**C0 - Static Radial Rating**

816000 N
183000 lbf

C1(2) - Dynamic Radial Rating (Two-Rows)

621000 N
140000 lbf

Factors**e - ISO Factor³**

0.28

Y0 - ISO Factor⁴

2.32

Y1 - ISO Factor⁵

2.38

Y2 - ISO Factor⁶

3.54

Reference Thermal Speed Rating (Grease)

2200 rpm

Reference Thermal Speed Rating (Oil)⁷

2600 rpm

Cg - Geometry Factor⁸

0.0754

¹ Maximum housing fillet radius that bearing corners will clear.

² Maximum shaft fillet radius that bearing corners will clear.

³ These factors apply for both inch and metric calculations. Consult your Timken representative for instruction on use.

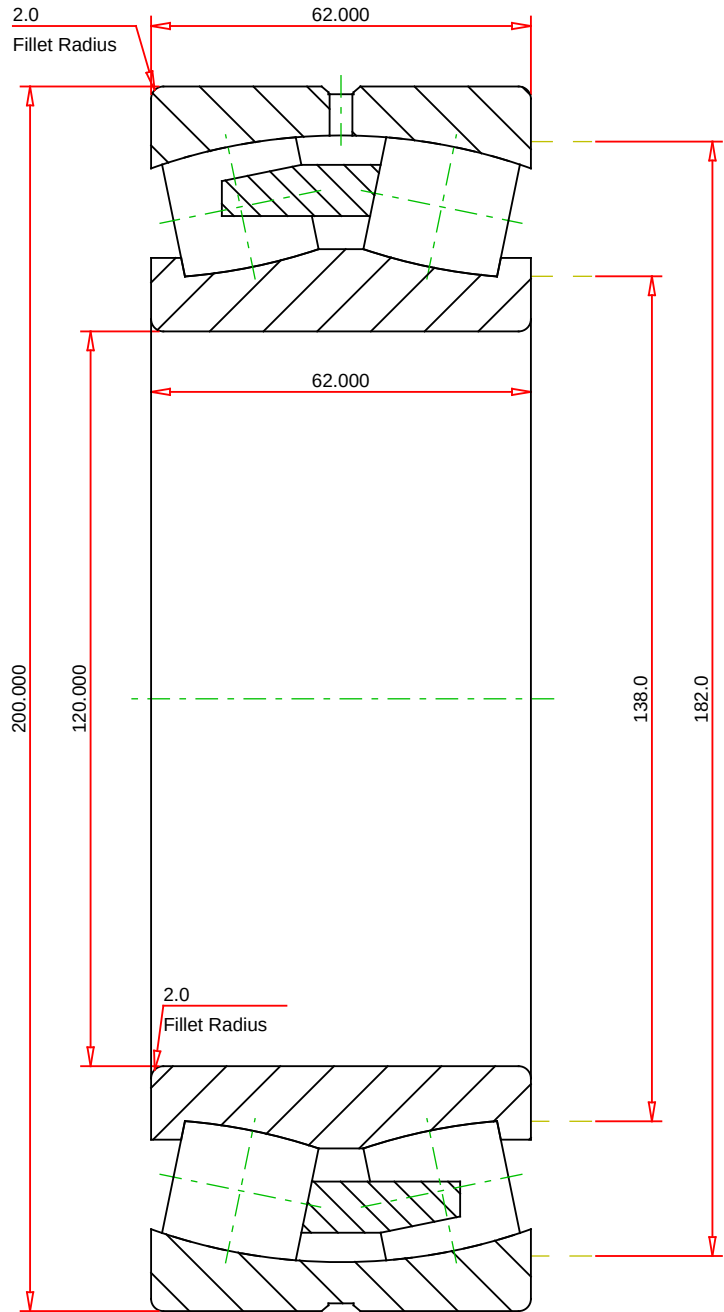
⁴ These factors apply for both inch and metric calculations. See engineering

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⁷ See thermal speed ratings in the engineering section.

⁸ Geometry constant for Lubrication Life Adjustment Factor a_3 .



METRIC UNITS

Number of Rollers Per Row	21
ISO Factor e	0.28
ISO Factor Y0	2.32
ISO Factor Y1	2.38
ISO Factor Y2	3.54
Bearing Weight	7.9 kg
Cage Type	EM
Cage Material	Brass



THE TIMKEN COMPANY
NORTH CANTON, OHIO USA

23124EMW33
SRB ASSEMBLY

Dynamic Radial Rating (Two Rows)	621000	N
Static Radial Rating	816000	N

Every reasonable effort has been made to ensure the accuracy of the information contained in this writing, but no liability is accepted for errors, omissions or for any other reason.

FOR DISCUSSION ONLY