



The Timken Company

4500 Mt Pleasant St. NW

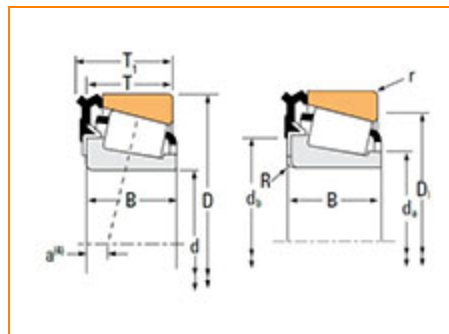
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Part Number LM48548 - LM48510 (LM48500LA), Tapered Roller Bearings - TSL (DUO-FACE® Plus Seal) Imperial

Tapered Roller Bearings - TSL (DUO-FACE® Plus Seal) Imperial



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

Specifications

Series	LM48500
Cone Part Number	LM48548
Cup Part Number	LM48510
Seal Part Number	LM48500LA
Design Unit	Inch
Cage Material	Stamped Steel

Dimensions



- Bore

1 3/8 in
34.925 mm

D - Cup Outer Diameter	2.5625 in 65.088 mm
B - Cone Width	0.7200 in 18.288 mm
C - Cup Width	0.5500 in 13.970 mm
T - Bearing Width	0.71 in 18.034 mm
T1 - Total Width	0.7850 in 19.940 mm

Abutment and Fillet Dimensions

R - Cone Backface "To Clear" Radius¹	0.14 in 3.600 mm
r - Cup Backface "To Clear" Radius²	0.050 in 1.27 mm
da - Cone Frontface Backing Diameter	1.63 in 41.5 mm
db - Cone Backface Backing Diameter	1.89 in 48 mm
Da - Cup Frontface Backing Diameter	2.44 in 61.00 mm
Db - Cup Backface Backing Diameter	2.28 in 57.91 mm
Ab - Cage-Cone Frontface Clearance	0.08 in 2 mm
Aa - Cage-Cone Backface Clearance	0.01 in 0.3 mm
a - Effective Center Location³	-0.15 in -3.8 mm

Basic Load Ratings

C₉₀ - Dynamic Radial Rating (90 million revolutions)⁴	3760 lbf 16700 N
C₁ - Dynamic Radial Rating (1 million revolutions)⁵	14500 lbf 64600 N
C₀ - Static Radial Rating	14200 lbf 63100 N
C_{a90} - Dynamic Thrust Rating (90 million revolutions)⁶	2430 lbf 10800 N

Factors

K - Factor⁷	1.55
e - ISO Factor⁸	0.38
Y - ISO Factor⁹	1.59
Y₁ - ISO Factor¹⁰	1.79
Y₂ - ISO Factor¹¹	2.67
C_g - Geometry Factor¹²	0.0666

¹ These maximum fillet radii will be cleared by the bearing corners.

² These maximum fillet radii will be cleared by the bearing corners.

³ Negative value indicates effective center inside cone backface.

⁴ Based on 90×10^6 revolutions L_{10} life, for The Timken Company life calculation method. C_{90} and C_{a90} are radial and thrust values.

⁵ Based on 1×10^6 revolutions L_{10} life, for the ISO life calculation method.

⁶ Based on 90×10^6 revolutions L_{10} life, for The Timken Company life calculation method. C_{90} and C_{a90} are radial and thrust values for a single-row, $C_{90(2)}$ is the two-row radial value.

⁷ These factors apply for both inch and metric calculations. Consult your Timken representative for instruction on use.

⁸ These factors apply for both inch and metric calculations. Consult your Timken representative for instruction

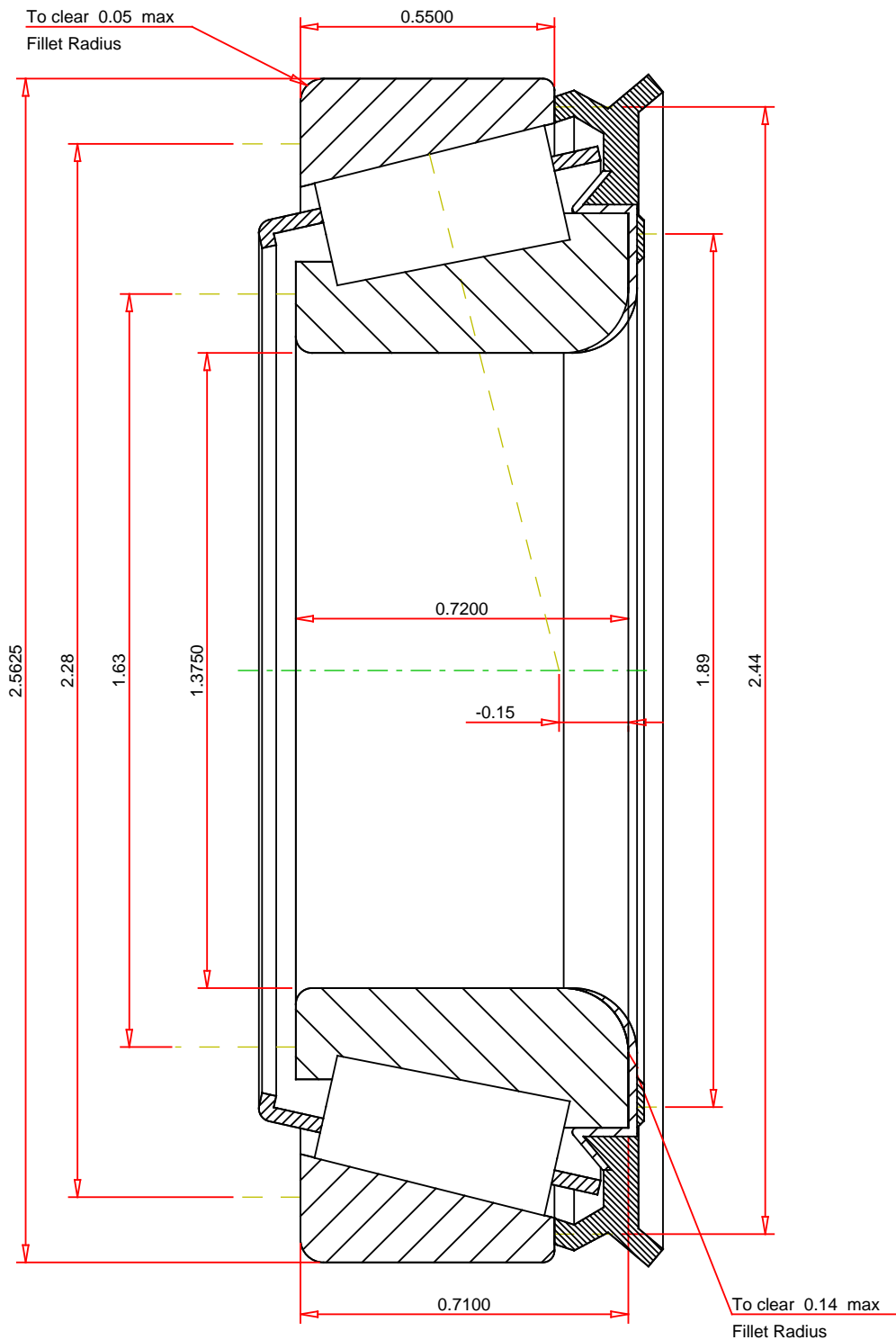
on use.

⁹ These factors apply for both inch and metric calculations. Consult your Timken representative for instruction on use.

¹⁰ These factors apply for both inch and metric calculations. Consult your Timken representative for instruction on use.

¹¹ These factors apply for both inch and metric calculations. Consult your Timken representative for instruction on use.

¹² Geometry constant for Lubrication Life Adjustment Factor a_3 .



IMPERIAL UNITS

ISO Factor - e 0.38
ISO Factor - Y 1.59

Number of Rollers Per Row 19
Effective Center Location -0.15 inch

TIMKEN®

THE TIMKEN COMPANY
NORTH CANTON, OHIO USA

LM48548 - LM48510 (LM48500LA)
Tapered Roller Bearings - TSL (DUO-FACE® Plus Seal) Imperial

K Factor	1.55
Dynamic Radial Rating - C90	3760 lbf
Dynamic Thrust Rating - Ca90	2430 lbf
Static Radial Rating - C0	14200 lbf
Dynamic Radial Rating - C1	14500 lbf

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