Federal Railroad Administration, DOT

§ 215.105 Defective axle.
A railroad may not place or continue in service a car, if—
(a) An axle on the car has a crack or is broken;
(b) An axle on the car has a gouge in the surface that is—
(1) Between the wheel seats; and
(2) More than one-eighth inch in depth;
(c) An axle on the car, used in conjunction with a plain bearing, has an end collar that is broken or cracked;
(d) A journal on the car shows evidence of overheating, as evidenced by a pronounced blue black discoloration; or
(e) The surface of the plain bearing journal on the axle, or the fillet on the axle, has—
(1) A ridge;
(2) A depression;
(3) A circumferential score;
(4) Corrugation;
(5) A scratch;
(6) A continuous streak;
(7) Pitting;
(8) Rust; or
(9) Etching.

§ 215.107 Defective plain bearing box: General.
A railroad may not place or continue in service a car, if the car has—
(a) A plain bearing box that does not contain visible free oil;
(b) A plain bearing box lid that is missing, broken, or open except to receive servicing; or
(c) A plain bearing box containing foreign matter, such as dirt, sand, or coal dust, that can reasonably be expected to—
(1) Damage the bearing; or
(2) Have a detrimental effect on the lubrication of the journal and the bearings.

§ 215.109 Defective plain bearing box: Journal lubrication system.
A railroad may not place or continue in service a car, if the car has a plain bearing box with a lubricating pad that—
(a) Has a tear extending half the length or width of the pad, or more;
(b) Shows evidence of having been scorched, burned, or glazed;
(c) Contains decaying or deteriorated fabric that impairs proper lubrication of the pad;
(d) Has—
(1) An exposed center core (except by design); or
(2) Metal parts contacting the journal; or
(e) Is—
(1) Missing; or
(2) Not in contact with the journal.

§ 215.111 Defective plain bearing.
A railroad may not place or continue in service a car, if the car has a plain bearing—
(a) That is missing, cracked, or broken;
(b) On which the bearing liner—
(1) Is loose; or
(2) Has a broken out piece; or
(c) That shows signs of having been overheated, as evidenced by—
(1) Melted babbitt;
(2) Smoke from hot oil; or
(3) Journal surface damage.

§ 215.113 Defective plain bearing wedge.
A railroad may not place or continue in service a car, if a plain bearing wedge on that car is—
(a) Missing;
(b) Cracked;
(c) Broken; or
(d) Not located in its design position.

§ 215.115 Defective roller bearing.
(a) A railroad may not place or continue in service a car, if the car has—
(1) A roller bearing that shows signs of having been overheated as evidenced by—
(i) Discoloration; or
(ii) Other telltale signs of overheating such as damage to the seal or distortion of any bearing component;
(2) A roller bearing with a—
(i) Loose or missing cap screw; or