



SERVICE BULLETIN

Title: 17/19 EX/FA Shroud 8 & 9
Shrink Fit on First Stage Impeller
Models Affected: 17/19 EX/FA

Number: C9705
Date: 2/5/97
Supersedes: New

Purpose:

To advise the field of a change on the first stage impeller on all 17/19EX's with FA compressors and 17/19FA's. The change effects 8 and 9 size shrouds only.

File: Compressor-Motor-Drive-Gears

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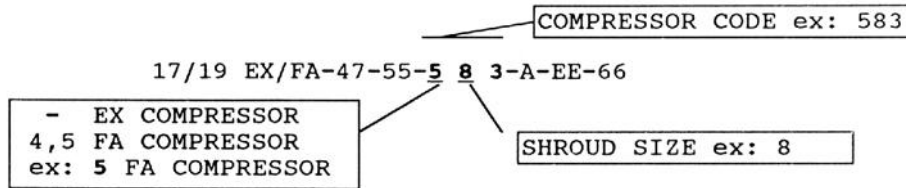
Approved By: Alan M. Johnson

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Background:

Most centrifugal compressors have an interference fit between the impeller shaft and impeller to keep the impeller concentric with the shaft. This interference in the last third of engagement of the impeller onto the shaft is caused by a .001" to .003" step in the high speed shaft. The impeller should be heated to allow it to slip over the step in the shaft.

The shroud size is indicated by the second digit of the three digit compressor code. (see example)



Model Number Example

Information:

There has been a design change made on the first stage impeller of all 17 and 19EX's with high tonnage 8 and 9 size shrouds. Along with the .001" to .003" step in the shaft which provides for an interference fit toward the back of the impeller a step (.003" reduction in inside diameter) has been added to the bore of the impeller on the inlet side. This allows for concentricity to be maintained along the entire length of the bore for stability.

Installation:

Heat the impeller in an oven or evenly with a rose bud tipped torch to 210-220 degrees F (99-104 degrees C). Use a temple stick to be sure the impeller is not overheated. Insure that the impeller, shim pack and spacer are bottomed out against the second stage impeller and are held firmly in place while the impeller cools.