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American Gear Manufacturers Association ANSI/AGMA 9006-A16

American National Standard

Flexible Couplings – Basis for Rating

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Flexible Couplings – Basis for Rating ANSI/AGMA 9006-A16

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Approved April 18, 2016

ABSTRACT

This standard presents criteria and guidelines for the establishment of the basis for ratings of standard flexible couplings. Due to the diversity of coupling types, details of design such as formulas and analysis used to derive the stresses, etc. are often considered proprietary and are not considered in this standard. This standard is of importance to coupling manufacturers, users and equipment designers for the proper selection, comparison and application of flexible couplings.

Published by

American Gear Manufacturers Association 1001 N. Fairfax Street, Suite 500, Alexandria, Virginia 22314

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Printed in the United States of America

ISBN: 978-1-55589-057-5

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Foreword

[The foreword, footnotes and annexes, if any, in this document are provided for informational purposes only and are not to be construed as a part of ANSI/AGMA 9006-A16, *Flexible Couplings – Basis for Rating*.]

The intent of ANSI/AGMA 9006-A16 is to provide insight into variables that are considered by coupling designers when rating flexible couplings. This standard was developed after intensive study of existing literature, design practices, and manufacturing procedures for the rating of flexible couplings

The first draft of ANSI/AGMA 9006-A16 was created in June 2005. It was approved by the AGMA membership in January 2016. It was approved as an American National Standard on April 18, 2016.

Suggestions for improvement of this standard will be welcome. They should be sent to tech@agma.org.

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AMERICAN NATIONAL STANDARD

ANSI/AGMA 9006-A16

American National Standard -

Flexible Couplings – Basis for Rating

1 Scope

This standard presents criteria and guidelines for the basis of flexible coupling ratings. It is not a comprehensive rating method that can be applied to a specific product or manufacturer.

Due to the diversity of coupling types, this standard presents generally accepted practices rather than rigorous engineering analyses. This standard is of importance to coupling manufacturers, users and equipment designers for the proper selection and application of flexible couplings.

1.1 Applicability

This document is applicable to standard couplings as defined by ANSI/AGMA 9009.

1.2 Exclusions

Details of design, such as formulas and analyses used to derive the specific coupling stresses, are often considered proprietary and are not considered in this standard.

It does not address special couplings that are engineered and manufactured specifically to meet the operating conditions of the equipment train in which they will be installed.

Additionally, flexible shafts, quill shafts, universal joints, magnetic couplings, or devices which exhibit slip such as clutches, fluid couplings, or torque converters are also excluded.

2 Normative references

The following standards contain provisions which, through reference in this text, constitute provisions of this American National Standard. At the time of publication, the editions indicated were valid. All standards are subject to revision, and parties to agreements based on the American National Standard are encouraged to investigate the possibility of applying the most recent editions of the standards listed.

ANSI/AGMA 9000, Flexible Couplings – Potential Unbalance Classification ANSI/AGMA 9004, Flexible Couplings – Mass Elastic Properties and Other Characteristics ANSI/AGMA 9009, Flexible Couplings – Nomenclature for Flexible Couplings ANSI/AGMA 9104, Flexible Couplings – Mass Elastic Properties and Other Characteristics (Metric Edition) ANSI/AGMA 9110, Flexible Couplings – Potential Unbalance Classification (Metric Edition)

3 Symbols and definitions

The terms used in this document are defined in Table 1.

NOTE: These definitions may differ from those in other AGMA publications. The user should not assume that familiar terms can be used without a careful study of their definitions.