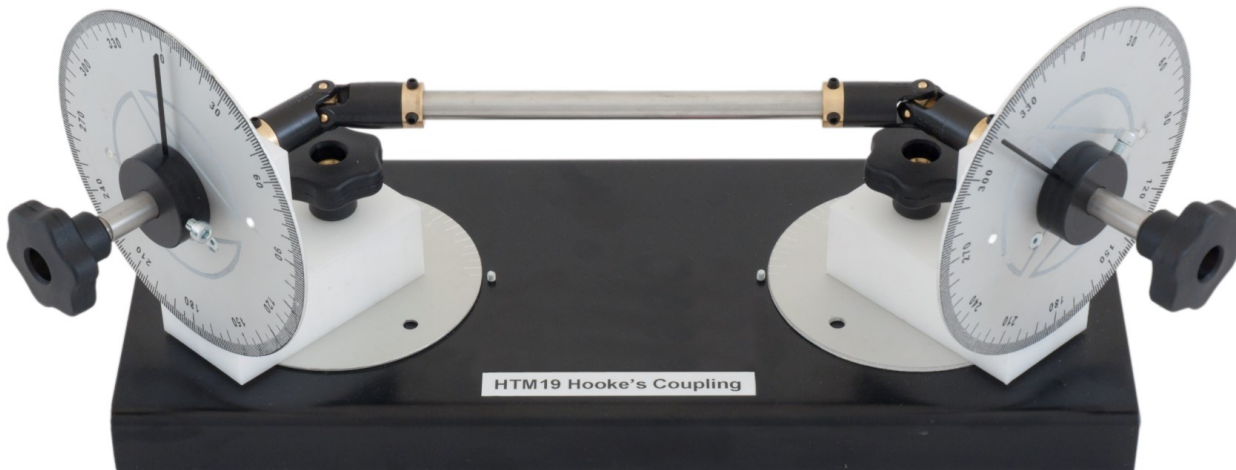




HOOKE'S COUPLING

HTM19



Features

- Desktop teaching mechanism
- Two independent Hooke's joints with common shaft
- Wide range of shaft misalignment angles
- Input and output shaft rotations measured by 360° protractor scale
- Inference of relative shaft velocities and accelerations

Description

The apparatus consists of an identical Hooke's coupling at each end of a shaft. The axis of each coupling can be independently varied relative to the main shaft axis. Each coupling has a pointer and protractor scale so that the angular difference between the input and output shafts can be determined for a range of shaft angular positions. A wide variety of angular settings for single or double couplings are possible. The couplings are mounted on a freestanding base. The pointer can easily be moved relative to their protractors. The angular position of the coupling axes can be quickly adjusted using the quick release knobs. The rotational movement of the shaft is smooth due to the minimal friction bearings incorporated within each coupling arrangement. Graph plots of the angular movement can be made and used to compare results to theory. A comprehensive instruction manual for student and lecturer is provided along with a 2-year warranty for the apparatus.

Learning capabilities

- To observe the relative angular displacement of the shafts at opposite ends of a single and double Hooke's Joint.
- To observe the effect of changing the angles between the axes of the coupling(s) and shaft on the relative angular shaft displacements
- To determine by graphical differentiation the relative angular velocities of the shafts
- To compare the experimental results with theoretical predictions

Technical Specification

- 2 x Primary protractors dia 127mm
- 2 x Secondary protractors dia 101.6mm
- 1 x Connecting shaft 230mm (L)
- 2 x Nylon swivel brackets (100mm x 65mm x 50mm)
- 2 x Universal joints fitting 100mm bar

What's in the Box?

- 1 x Hooke's Coupling unit
- 1 x Manual containing experimental set-up, procedures

Weights & Dimensions

- Net dimensions: 380mm x 150mm x 165mm
- Net weight 2kg

Operational Conditions

- Storage temperature: -10°C to +70°C
- Operating temperature range: +10°C to +50°C
- Operating relative humidity range: 0 to 95%, non condensing

Ordering information

To order this product, please call PA Hilton quoting the following code:
HTM19 HOOKE'S COUPLING

All brand and/or product names are trademarks of their respective owners. Specifications and external appearance are subject to change without notice. The colour of the actual product may vary from the colour shown in the brochure.

Copyright © 2018 P.A. Hilton Limited. All rights reserved. This technical leaflet, its contents and/or layout may not be modified and/or adapted, copied in part or in whole and/or incorporated into other works without the prior written permission of P. A. Hilton Limited. Hi-Tech Education is a registered trade mark of P. A. Hilton Limited.

COUNTRY OF ORIGIN - UK WARRANTY PERIOD - 5 YEARS