



Fluid film friction - phenomena, research and application in technology

Lecturer: dr hab. inż. Michał Wasilczuk, prof. nadzw. PG (WM)

Contents:

Subject (approximately 3 hours each)	Contents
Fluid film bearings introduction	Fundamentals of friction. History and development of fluid film bearings. Reynolds equation, phenomena theoretical models, experimental research, design principles, practise of manufacturing and application
Large thrust bearings	Design and application. Theoretical models and experimental research, field testing, condition monitoring in industrial applications. Main problems and development.
Journal bearings	Design and application. Theory and experiment. Shaft stability. Antivibration bearings
Lubrication	Lubricants - conventional, bio degradable. Potential of using hi viscosity index lubricants. Water lubrication - benefits and problems. Friction losses, cooling of the lubricant
Materials in fluid film bearings	Conventional and novel bearing materials. Benefits and problems of application of polymer lined bearings. DLC coatings in fluid film bearings.

Terminy wykładów			
Data	Dzień tyg.	Godzina	Sala
2015-05-05	Wt	9.15-12.00	Mech 140
2015-05-06	Śr	9.15-12.00	Sala 13 - Lab. im. Niemkiewicza ¹
2015-05-11	Pn	9.15-12.00	Sala 13 - Lab. im. Niemkiewicza
2015-05-12	Wt	9.15-12.00	Sala 13 - Lab. im. Niemkiewicza
2015-05-18	Pn	9.15-12.00	Sala 13 - Lab. im. Niemkiewicza

¹ Laboratorium Niemkiewicza: z tyłu za Laboratorium Maszynowym - od strony Aud Novum



KAPITAŁ LUDZKI
NARODOWA STRATEGIA SPÓJNOŚCI

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