



Stowarzyszenie Inżynierów i Techników Mechaników Polskich:
Sekcja Uszczelnień i Techniki Uszczelniania
Wydział Mechaniczno-Energetyczny Politechniki Wrocławskiej
SIMP Oddział we Wrocławiu

XIV International Scientific-Technical Conference

SEALS AND SEALING TECHNOLOGY OF MACHINES AND DEVICES

Honourable patronage

Prof. Tadeusz Więckowski Rector of Wrocław University of Technology

PhD Eng. Piotr Janicki Chairman of the Board SIMP

Wrocław, 31-st May -1-st June 2016

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Bogdan Antoszewski – Świętokrzyski University of Technology

Conference Program

May, 30th (Monday) – COURSES - Centrum Kongresowe
Politechniki Wrocławskiej, ul Janiszewskiego 8, **building D-20**

13.00 – 15.45: COURSE I (room no. 114)

„*Semi-metallic gaskets – development trends and applications*”
prof. dr hab. inż. Marek Gawliński

15.45-16.15: lunch

(Strefa Kultury Studenckiej ul. Hoene-Wrońskiego 10-12, 1-st floor)

16.15 – 19.00: COURSE II (room no. 114)

„*Coatings and modifications of the sealing surfaces by means of
different technologies*”:
prof. dr hab. inż. Bogdan Antoszewski

May, 31st (Tuesday) Centrum Kongresowe Politechniki
Wrocławskiej,
ul Janiszewskiego 8, building D-20, **CONGRESS HALL 10D**

9.00 Conference opening.

Marek Gawliński – *Chairman of the Seals and Sealing Technology
Group of SIMP.*

Zbigniew Gnutek – *Dean of Mechanical and Power Engineering
Faculty of Wrocław University of Technology.*

9.20 – 11.00 SESSION I. Gaskets.

Chairman: Marek Gawliński.

"Camprofile gasket with elastic core" P. Jaszak

*"Theoretical and experimental research concerning gasket stiffness to be
applied in load calculation of the flange – gasket – bolts joints for mounting
condition $I = 0$."* D. Ispas, A. Ispas

*"Influence of the assembly quality on bolted joints in consideration of gasket
data according to EN 13555"* A. South.

"Standard EN 1591-4 an issue of safety of pressurized devices"
R. Sieczkowski

*"Flange rotation – the surprise phenomenon for the most sceptical specialists
participating in the training courses for the qualification of personnel
competency in the assembly of the bolted connections of critical service
pressurized systems (EN 1591-4:2014)"* V. Ispas, R. Lazar

*"Effect of the preparation of polyurethane foam hardness in terms of
application as a gasket"* D. Capanidis, P. Kowalewski, M. Krauze

"Gaskets in bio-fuels transport installations – gaskets durability Investigations" J. Rogula

11.10 – 11.30 coffee break.

11.30 – 13.00 SESSION II Face seals – technology.

Chairman: Czesław Kundera.

"New method of working surfaces wear-resistance increase of impulse face seal metal rings" V. Tarel'nyk , V.S Martsynkovskyy, A Zhukov E. Konoplianchenko, M. Dovzhyk, A. Belous

"Using electroerosive alloying for upgrading elements of seals for the compressor equipment" V.A Martsynkovskyy, V.B Tarel'nyk, V.S Martsynkovskyy, V.I Yurko

"Modern carbide coatings thermally sprayed in HVOF technology on the sliding rings of face seals" A. Iwaniak

"Modelling and shaping of sliding rings in the face seals" B. Antoszewski,

" Solution of exhaust duct sealing of centrifugal compressor" V.S. Martsynkovskyy I, Kukhariev A. Lazarenko, Ya. Bilyk

13.00 -14.00 lunch (Strefa Kultury Studenckiej ul. Hoene-Wrońskiego 10-12, 1-st floor)

14.00-15.45 SESSION III. Valves seals.

Chairman: J. Salwiński.

"Carbon fiber reinforced graphite ring with improved elasticity" A. Malakho, O.N. Shornikova, V.V. Avdeev.

"Influence of chosen factors on the friction coefficient value of the pair steel expanded graphite in the seals for stuffing boxes" A. Rewolińska

" Ball valve tightness testing with different profiles of ball seals" G. Romanik, J. Rogula

"Process of both shaping and maintaining the graphite layer in the pair steel stem – graphite sealing ring in reciprocating motion" A. Rewolińska

"Application of O-ring seals in special operating conditions" G. Kowalik, W. Horak., J. Salwiński J., M. Szczęch

" Determination of the elasto–damping properties of photopolymers to be used in incremental technology" Cz. Kundera, W. Martsynkovskyy

"Bellows as a sealing element in the industrial valves" G. Romanik, J. Rogula

15.45-16.00 coffee break.

17.00 -18.30 Visiting of „Hydropolis” (ul. Na Grobli 19-21)

20.00 gala dinner at Piwnica Świdnicka (Townhall 1)

1st, June (Wednesday) Centrum Kongresowe Politechniki
Wrocławskiej, ul Janiszewskiego 8, building D-20,
CONGRESS HALL 10D

9.00 – 10.45 SESSION IV Non-contact and reciprocating seals.

Chairman: B. Antoszewski.

"Influence of end floating seals and combined radial bearing and seal assemblies on centrifugal compressor vibration state" V.I. Yurko, I.

Kukhariev, V.S Martsynkovskyy

„The application of ferrofluids in the reciprocating seals" G. Kowalik, W. Horak, J. Salwiński, M. Szczęch

"Ways to reduce the sealing surfaces wettability" J. Duenas-Dobrowolski, M. Gawliński

"Determination of the wear state of sealing systems in hydraulic cylinders"

W. Okularczyk, M. Kurpiński

"Seals and sealing devices for hydraulic machinery and equipment in terms of standardization" W. Burzyński, M. Banaś

"Research of lip seals working in air- conditioning compressors " J. Rogula

10.45-11.15 coffee break.

11.15 – 12.15 SESSION V Chosen problems of sealing technology.

Chairman: P. Jaszak

"Gasket. Not only the tightness counts" J. Zajączek

"Friction resistance during assembly of plastic elements" P. Kowalewski, M. Opałka, W. Wieleba

"Industry Machinery and Equipment - global and European - Polish competitive opportunities" H. Chrostowski, Z. Popczyk, J. Szadkowska

12.15 closure of Conference – M. Gawliński.

12.30 lunch (Strefa Kultury Studenckiej ul. Hoene-Wrońskiego 10-12, 1-st floor)