



SUBJECT DATASHEET

Semester:	2009/10/1
Subject:	Selected Chemical Technologies II. Laboratory Practice
Code:	VEMKTEB138T
Responsible department:	Department of Hydrocarbon and Coal Processing
Responsible department code:	MKOL
Responsible lecturer:	dr. László Szokonya

Educational objectives:

Az elméleti oktatáshoz kapcsolódó laboratóriumi és számítási gyakorlatok elsajátítása

Detailed content of the subject:

1. Introduction, prevention of accidents. 2. Benzene saturating isomerization (with calculation methods) Laboratory leader: Dr. Jenő Hancsók 3. Hydrogenation of FCC gasolines (with calculation methods) Laboratory leader: Dr. Jenő Hancsók 4. Hydrogenation of middle distillates (with calculation methods) Laboratory leader: Dr. Jenő Hancsók 5. Glass industry technologies (with calculation methods) Laboratory leader: Dr. Tamás Korim 6. Ceramic industry technologies (with calculation methods) Laboratory leader: Dr. Tamás Korim 7. Catalytic aftertreatment of exhaust gases (with calculation methods) Laboratory leader: Dr. József Kovács 8. Catalytic decomposition of natural gases (with calculation methods) Laboratory leader: Dr. József Kovács 9. Application of closed radiation sources in industrial technologies (with calculation methods) Laboratory leader: dr. Zoltán Németh 10. Contamination and decontamination in nuclear power plant (with calculation methods) Laboratory leader: Krisztián Radó 11. Investigation of rectification (with calculation methods) Laboratory leader: Dr. László Szokonya 12. Liquid adsorption technologies (with calculation methods) Laboratory leader: Dr. László Szokony 13. Homogeneous catalytic hydroformilation (with calculation methods) Laboratory leader: Dr. Szilárd Törös 14. Friedel-Crafts acylation in cascade reactor line (with calculation methods) Laboratory leader: Dr. József Bakos 15. Examination

Requirements:

Evaluation aspects: 60% preciosity of measurements, 20% knowledge and 20% calculation exercises. Rating: 90% ? outstanding

Required and suggested references:

Wiisermel, K., Appe, H.J.: Ipari szerves kémia, Nemzeti Tankönyvkiadó, Budapest, 2003. Hancsók Jenő.: Korszerű motor- és sugárhajtómű üzemanyagok II. Dízelgázolajok tankönyv, 1999. Hancsók Jenő, Nagy Gábor: „Katalitikus hidrogénező eljárások a kőolajiparban”, Oktatási segédlet, Veszprém, 2007. Törös, Sz.: Az előadó által összeválogatott és a hallgatók részére az interneten hozzáférhető oktatási segédletek. Magyar



SUBJECT DATASHEET

Semester:	2009/10/1
Subject:	Selected Chemical Technologies II. Laboratory Practice
Code:	VEMKTEB138T
Responsible department:	Department of Hydrocarbon and Coal Processing
Responsible department code:	MKOL
Responsible lecturer:	dr. László Szokonya

Required and suggested references:

Kémikusok Lapja következő számai: 2005/6-12, 2006/1-12, 2007/1-7 Gary, J.H.: Petroleum Refining Technology and Economics 3rd , Marcel Dekker, N.Y. 1999. Speight,J.G.: The chemistry and technology of petroleum 3rd . Marcell Dekker, 1998. Speight,J.G.: Petroleum Chemistry and Refining, Taylor and Francis 1998. Sequeira, A.: Lubricant base oil and wax processing, Marcell Dekker, 1994. Weissermel, K., Arpe, H-J.: Ipari szerves kémia, Nemzeti Tankönyvkiadó, Budapest, 1993. Mc Ketta, J.: Petroleum Processing Handbook, Marcell Dekker, 1992. Hobson, G.D.: Modern Petroleum Technology, J. Wiley, 1986. Chauvel, A., Lefevbre, G.: Petrochemical processes I-II., 1989. Fahey, D.R.: Industrial Chemicals via C1 Processes, A.C.S., 1986. Wiseman, P.: Petrochemicals, John Wiley, N.Y.,1986. Meyers, R.A.: Handbook of petroleum Refining Processes, McGraw-Hill Inc., N.Y., Toronto, 1996. Chauvel,A, Lefebvre,G.: Petrochemical processes I-II. Gulf. 1989. Krevelen, D.W.Van.: Properties of polymers, Elsevier, Amsterdam,..., Tokyo, 1990. Fourné, F.: Synthetic Fibers, Hanser Publishers, Munich 1999. Gunardson, H.: Industrial Gases in Petrochemical processing, Marcel Dekker Inc.,1998. Scheirs, J., Kaminsky, W.: Metallocen based Polyolefins, preparation, properties and technology Vol.1, John Wiley and Sons, Ltd., 2000. Olah, G.A., Molnár, Á.: Hydrocarbon chemistry, John Wiley and Sons, Inc., 1995.