Basics of Material Technology (BAEAAE1BNE) – e-learning course, introductory, the structure of the subject

In industrial practice, as in everyday life, the materials used are extremely diverse. From these materials different products such as: everyday objects, tools, machines, devices and equipment are made. Material manufacturing and processing technologies produce such semi-finished products or preforms from which final products can be manufactured.

The Basics of Material Technology is systematized in an e-learning subject and presents the manufacturing technologies of metallic and non-metallic materials, beginning from metallurgy to the polymer and ceramic production technologies.

The subject is composed of 12 chapters as a digital curriculum, and the content of the chapters (lessons) is described in the course description.

Each chapter is structured as follows:

- a) Power Point Presentation, which is the core material of the chapter,
- b) digital curriculum of 2 university e-learning textbooks,
- MATERIAL TECHNOLOGIES, course bulletin, Typotex Publisher, Budapest, 2012, ISBN 978-963-279-684-0, www.tankonyvtar.hu
- Kalpakjian, S., Schmid, S. R.: Manufacturing Engineering and Technology, Prentice Hall, 2009
- c) aids: additional, explanatory, knowledge-expanding electronic aids, web contents,
- d) video materials related to the chapter,
- e) control questions related to the chapter,
- f) electronic tests (Moodle) for the chapter.

Each chapter has a detailed learning guide that helps students learn how to acquire the curriculum.

I wish successful learning and useful acquisition of knowledge to all those students who have taken the Basics of Material Technology subject.

Budapest, 4th of June 2022.

Dr. Pinke Péter subject leader