Subject code	Credits
INF2023	3

Title

AUDIOVIZUALINĀS TECHNOLOGIJOS I

Title in English

AUDIOVISUAL TECHNOLOGIES I

Subject goal and annotation

The course examines the concepts of digital video technology. Considered application areas include the digital video format, codec, video effects, editing, transition, nonlinear editing, titles, transparency, alpha channel, capture, export... etc.

Prerequisites

Basics of IT technologies

Relationship between the learning outcomes of the Programme and learning outcomes of the subject

Learning outcomes of the Programme	Learning outcomes of the subject	Criteria for measuring the achievement of learning outcomes
2. Knowledge of humanities and social sciences, and its relation to engineering. 4. Knowledge of basic and advanced multimedia theories and applications, ability to apply it. 5. Knowledge of basic art theory, history and methods in arts, their application. 14. Ability to analyze and evaluate art projects. 18. Critical analysis of Internet and multimedia projects context and their influence to business, culture and society. 19. Fast and efficient adaptation to the quickly changing cultural, economical and technological environment.	Ability to evaluate technologies and tools used in realised projects	Oral student presentation, critical examination. Student demonstrates the ability to analyse video and media projects
	To plan and organise the process of video product creation	Student demonstrates the ability to analyse and evaluate video products (to do multimedia analysis).
	To digitalise video material	Student demonstrates the ability to chose digital tools for digitalisation project and to make changes in the process. Student demonstrates the ability to evaluate the video elements of media project
	To edit, exchange video and to make colour correction	Students are able to model, analyse and correct the elements of multimedia project
	To use masks in the process of video overlying	Students are able to model, analyse and correct the elements of multimedia project
	To create video for multimedia projects	Student demonstrates the ability to work with video material in real multimedia projects.

Subject content

	Lecture topics and contents	Hours
1.	History of audio technologies, sound in computer	3
2.	Sound out / in computer process, introduction to softwares and sound codecs	3
3.	Introduction to equipment of video editing	3
4.	Nonlinear film editing	3
5.	Lightening and working with video camera	3
6.	Multilayering film editing	3

7.	Basics of soundtrack, methods, technical parameters, coding and decoding	3
8	The composition of layers and injected video elements	3
9	Analysis of softwares for video editing	3
10	Analysis of technical instructions for audiovisual products	3
	Total	30

Practical work contents

1. Analysis and evaluation of technologies and digital tools used in the process of real projects
2. Analysis and modelling parts of video process; video digitalisation
3. Edit, exchange, use masks in video editing and colorise (colour correction)
4. Create video as a part of multimedia project

Evaluation of study results

Final written exam (50%), mid-term written exam (25%), and assessments of laboratory (practical) work (25%).

Distribution of subject study hours

Lectures	30
Laboratory work and seminars	15
Individual studies (including studies in groups, preparation for the mid-term and final exams)	36
Total	81

Recommended literature

No	**Authors of publication and title**	Number of copies available		
		in the Library of VMU	in specialized publication collections at VMU	in other libraries
Basic materials				
1.	Erica Sadun. Digital Video Essentials: Shoot, Transfer, Edit, Share. Sybex, 2003		2	
2.	Borko Furht (Editor-In-Chief).(2006) Encyclopedia of multimedia, Springer, Florida Atlantic University. Springer, 2006		1	
Supplementary materials				
1.	Interaction design. (2005) Jonh Wiley&Sons. Jonh Wiley&Sons, 2005			

Subject prepared and coordinated by

Lect. Remigijus Venckus