## 데이터사이언스융합전공 특강 (영어강의)

## **Special Lecture: Data Classification and Clustering Basics**

- **일시**: 2024년 5월 17일(금), 5월 24일(금)(이틀간 진행)
- 시간: 3:00-4:15pm
- 장소: 퇴계인문관 31709호
- Date: 2024/5/17 (Friday), 2024/5/24 (Friday) (2 days)
- Time: 3:00pm to 4:15pm
- Location: Toegye Hall of Humanities, No. 31709
- 데이터 사이언스 기본 수업으로 코딩 경험이 없는 학생도 참여 가능
- 교수 강의는 비디오 파일로 미리 제공하여 강의 전 시청 필수
- 강의실에서는 실습 진행, 노트북 준비 필수
- 이틀 모두 참석 가능한 학생만 참여 가능
- Students without coding experience can participate in this basic data science lecture.
- Professor lectures are provided in advance as video files, and watching them before the lecture is mandatory
- Practical sessions will be conducted in the classroom, so bringing a laptop is required.
- Only students available to attend both days are eligible to participate.
- RSVP by May 6<sup>th</sup>: <u>https://forms.gle/iSoFBmHviBtR2x9J9</u>



**Dr. Seungwon Yang** is an Associate Professor at Louisiana State University's School of Information Studies and the Center for Computation and Technology. He holds a Ph.D., M.S., and B.S. degrees from Virginia Tech's Department of Computer Science, and also has the B.S. degree from the Department of Electronic Engineering at SKKU. His research interests include crisis informatics, social media, and data science. For more information, please visit the following link: (https://www.lsu.edu/chse/slis/about\_us/bios/yang.php)

Session Title	Learning Period	Details
Setting up a	5/10-5/16	<ul> <li>Anaconda for Python and Python packages,</li> </ul>
data science	Video lectures	Jupyter Notebook, and Markdown
environment		<ul> <li>Pandas for data preprocessing</li> </ul>
	5/17	<ul> <li>Installing Anaconda and Python packages</li> </ul>
	In-class activities	Creating Jupyter Notebook with Markdown and
		Python code
		<ul> <li>Initial data analysis using Pandas and Matplotlib</li> </ul>
Classification and	5/17-5/23	<ul> <li>Classification (e.g., Random Forest algorithm)</li> </ul>
clustering basics	Video lectures	<ul> <li>Clustering (e.g., K-means)</li> </ul>
	5/24	Creating a classification pipeline (e.g., initial data
	In-class activities	analysis, running the algorithm, and evaluation of
		results)
		Clustering of data (e.g., initial data analysis and
		running the algorithm with evaluation metric)