| Topics | Specific Content | Date | week |
|---|---|---|---|
| Introduction | Introduction<br>related technologies<br>overview of data mining tasks (slides) | 8/23 | week 1 |
| Preliminaries | data and attributes (slides) | 8/25 | week 1 |
| | data preprocessing (slides) | 8/30, 9/1 | week 2 |
| | holiday | 9/6 | week 3 |
| | evaluation<br>using Weka (slides) | 9/8 (hw1 assigned) | week 3 |
| Data mining algorithms: association rules | motivation and terminology (slides)<br>example and basic idea: item sets | 9/13 | week 4 |
| | generate item sets and efficient rules (slide1 slide2) | 9/15, 9/20 | week 4,5 |
| | correlation analysis (slides)<br>experiments with Weka (slides) | 9/22 (hw2 assigned; hw1 due) | week 5 |
| Data mining algorithms: categorization | basic learning/mining tasks | 9/27 | week 6 |
| | inferring rudimentary rules (slide) | 9/29 | |
| | midterm review | 10/4 | week 7 |
| | midterm exam | 10/6 | week 7 |
| | decision trees (slide) | 10/11, 10/13 | week 8 |
| | covering rules | 10/18 | week 9 |
| | experiments with Weka | 10/20 (hw3 assigned; hw2 due) | |
| Data mining algorithms: clustering | basic issues in clustering | 10/25 | week 10 |
| | first conceptual clustering system | 10/27,11/1 | week 10,11 |
| | partitioning methods | 11/3, 11/8 | week 11,12 |
| | hierarchical methods | 11/10 | week 12 |
| | conceptual clustering | 11/15 | week 13 |
| | experiments with Weka | 11/17 (hw3 due) | |
| IoT data | data properties | 11/22 | week 14 |
| | algorithms | 11/24 | |
| | case study | 11/29 (project due) | week 15 |
| | Review for final exam | 12/1 | week 15 |
| | Final exam | 12/6 | 10:10am - 12:10pm |