

## 98-2 Preliminary Syllabus, Da-Yeh Univ

Information			
Title	編碼理論	Serial No. / ID	1446 / EGR5271
Dept.	電機工程學系碩士班	School System / Class	研究所碩士班1年1班
Lecturer	胡大湘	Full or Part-time	專任
Required / Credit	Optinal / 3	Graduate Class	NO
Time / Place	(二)56 / H719 (四)N / H719	Language	English

Introduction
<p>The coding field has exploded with new theoretical developments, several of which have had significant practical consequences. Three of these new developments stand out in particular: coded-modulation, soft decision decoding and soft-in and soft-out iterative decoding techniques. These new developments have revolutionized the way coding is applied to practical systems.</p> <p>Goal: convolutional codes, coded-modulation, soft decision decoding, turbo decoding, low density parity check decoding</p>

Outline
<p>1.Introduction 2.Convolutional Codes 3.Trellis-Based Decoding Algorithms for Convolutional Codes 4.Sequential and Threshold Decoding of Convolutional Codes 5.Trellis-Coded Modulation 6.Turbo Coding &amp; Decoding 7. low density parity check coding &amp; decoding 8.Auto Repeat Request Systems</p>

Prerequisite
error control coding