SPEECH COMMUNICATION
6.541J-24.968J-HST710J
Spring 2004

Lab 1 Commands   *Assigned: 02/24/03*

The sentences are saved in files **SEENPETE.WAV** (male) and **SEENPETEHH.WAV** (female) under each group's directory.

SECTION	COMMAND
(a)	lspecto filename (no extension needed) see linux intro. sheet to print waveforms: SEENPETE.PS and SEENPETEHH.PS
(b) to examine waveforms	xkl filename
(b)(ii)	to open a file for Postscript output, type 'g' to save a spectrum to the file, type '#' (you can save more than one to a single file) to close the file for printing, type 'g' to change spectrum parameters, type 'C' (must be capital C) and choose appropriate parameter from dialogue box: 'd' for length of DFT window 'e' for length of LPC analysis window
(b)(ii)(1)	Type 'S' (must be capital S)
(b)(ii)(2)	Type 'd' (remember to change DFT window length first)
(b)(ii)(3) interval	Type 'a' and enter start time and end time of desired (in ms) when prompted
(b)(ii)(4)	Type 'l' (lowercase L) (remember to change LPL DFT window lengths first)
(c)	Type 'r' and choose file from dialogue box when prompted

LINUX INTRODUCTION

to login   type username and password at text prompt

to start xkl   1) type startx
                            2) click left mouse button on "xterm" button
                            3) cd 6.541/groupX where X is your group letter
                            4) xkl *filename.wav*

to logout   1) click left mouse button on "Start"
                            2) select "Exit Fvwm 95" and "Yes, Really Quit"

on-line help   man (or man command)

show all files   ls
show file size and date   ls -l
search down directory...
        tree for file   ls *name.ext*
show current directory   pwd

change directories   cd name
change to top directory   cd ~/

delete a file   rm *name.ext;*
save file under new name   mv *name.ext name2.ext*
move file to new directory mv *name.ext new path/name.ext*

printing postscript   lpr *filename.ps*

XKL COMMANDS

XKL COMMAND LINE ARGUMENTS

Required arguments for XKL: none

Optional arguments (separated by spaces):

-h Usage (help) message

COMMANDS

?	help
q	quit the program (with opportunity to cancel)
p	Play a selected waveform (--e)
P	Play the entire waveform

Spectral Analysis:

d	DFT magnitude spectrum is now the default
s	Spectrogram-like spectrum is now the default
S	Spectrogram-like spectrum + DFT the default
c	Critical-Band spectrum is now the default
j	Critical-Band spectrum + DFT the default
T	Critical-Band spectrum, compute slope of spect above 1 kHz
l	Linear-Prediction spectrum + DFT is now the default
a	Average DFT magnitude spectra over selected time interval
A	Average DFT magnitude spectra at selected times
k	Spectral Average; over -kn/2 to +kn/2
C	Change a particular analysis parameter value
N	Output F & BW's of current analysis filters
V	Output listing of spectrum values within window

Hardcopy Commands:

g	Open/close a 4 spectra/page Postscript file
h	Open/close a 1 spectrum/page Postscript file
*	Save window to Postscript file (1 per page)
#	Save spectrum to Postscript file (4 spectra a page)

COMMANDS

Start,End markers:	(used for play command)
w	Set Start to current cursor position
e	End marker set to current cursor position
	START, END markers moved to buffer endpoints
** w	(to left of e) instead of s, because s was already taken

Cursor Control:	
t	move marker to time t
b,f	Move Backward/Forward by 10 ms
B,F	Move Backward/Forward by 50 ms
1,2	Set time to Start/End marker

Multi-file handling:	
r	Read another waveform
v	Replace current file with another waveform
+ -	Increment/Decrement waveform counter, look at next/previous waveform
n	Select from a menu of loaded waveforms to become the current waveform (if only two waveforms are loaded, the noncurrent waveform is automatically made current)

Arrow commands:	(waveform windows only)
up	Zoom in selected window (divide duration by 2)
down	Zoom out selected window (multiply duration by 2)
left	Step selected window (with cursor) leftward by length of window 1
right	Step selected window (with cursor) rightward by length

Mouse buttons:	
Index finger	click to move cursor to that point and print out x,y values
Middle button	click to play (same as P command)
Ring finger	bring all windows for this waveform to front

Window movement, resizing:	
	Use normal mouse functions, grabbing frame to move or 'Change the size' option in the window's corner menu box.

Spectrogram Display:	(in command line to disable spectrogram)
i	Display current wavefile as spectrogram
K	Recalculate spectrogram
u	Set length of spectrogram
,	Lighten spectrogram
.	Darken spectrogram