1. In Final Cut Pro export a quicktime reference movie

import		
Export	\mathbf{b}	QuickTime Movie
Send To	•	

 Use >Current Settings and make sure that "Make Movie Self-Contained is unchecked

ng:(Current Settings	+
de:(Audio and Video	•
ers:	None	
		•

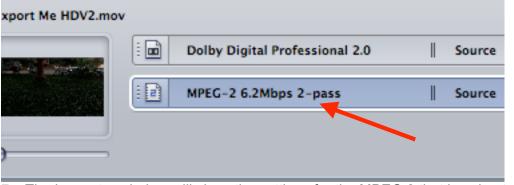
- 3. Open Compressor Software
- 4. Click on "Add File" and navigate to the QuickTime Reference that was just made.



 Select the DVD encoding settings to apply. Go to the Settings Tab>Apple>DVD>DVD:Best Quality 90 minutes. Drag the "MPEG-2 6.2 Mbps 2 pass" setting from this folder to the "Batch Window" to apply the encoding settings to the video Quicktime Reference.

Untitled	
Export Me HDV2.mov	Drag Settings and Destinations Here
O O O Settings	
Settings Destinations	
	+
Apple 4 Groups	<u> </u>
Apple Devices 3 Settings	
VD 10 Groups	
DVD: Best Quality 120 minutes 2 Settings	
DVD: Best Quality 150 minutes 2 Settings	
DVD: Best Quality 90 minutes 2 Settings	
Dolby Digital Professional 2.0 2.0 Dolby Digital audio at 192kbps	
MPEG-2 6.2Mbps 2-pass Fits up to 90 minutes of video with Dolby Digital audic at 1 a DVD-5	92 Kbps or 60 minutes with AIFF aud

6. Select the MPEG-2 clip to change the properties of the encode in the "Property Inspector"



 The Inspector window will show the settings for the MPEG 2 that is going to be encoded. If you don't see the inspector window go to >Window >Show Inspector
 Window Help

Minimiz	ze	ЖM
Zoom		
Bring A	ll to Front	
Save La	yout	
Manage	Layouts.	
Layouts	5	•
Show Ir	spector	7.81

8. Set the MPEG 2 encoding settings:

Click on the Video Format tab and that should show the native information about the file.

Will show the format, frame rate, aspect ratio, and native field dominance of the quicktime (SD will be lower field HD will be upper.) 23.98 WILL BE PROGRESSIVE. *NOTE: DO NOT CHANGE ANY OF THE VIDEO FORMAT SETTINGS. JUST LEAVE THIS TAB ALONE. COMPRESSOR WILL DEFALT TO NATIVE SETTINGS OF THE FILE*

Inspector		
Selected Target		
Fits up to 90 minutesFF audio on a DVD-5		
Encoder		
MPEG-2		
m2v Allow Job Segmenting		
Usage: SD DVD 🛟		
nat Quality GOP Extras		Clicking this will let
		•
Format: NTSC 🛟 🔅		you change the
me Rate: 29.97 🛟 🕸		settings
ct Ratio: 16:9 🛟 🕸		_
ninance: 🚺 Top First 🛟 🔅		
Choose start timerode		
	Fits up to 90 minutesFF audio on a DVD-5 Encoder MPEG-2 M2V Allow Job Segmenting Usage: SD DVD that Quality GOP Extras Format: NTSC me Rate: 29.97 tt Ratio: 16:9 *	Selected Target Fits up to 90 minutesFF audio on a DVD-S Encoder MPEG-2 M2V Allow Job Segmenting Usage: SD DVD that Quality GOP Extras Format: NTSC Rate: 29.97 t Ratio: 16:9 minance: Top First Construction of the second

9. Now click on the Quality Tab.

000	Inspector	
Name:	Selected Target	
Description:	Fits up to 90 minutesFF audio on a DVD-5	
	Encoder	
File Format:	MPEG-2 ;	
Extension:	m2v Allow Job Segmenting	
Stream	Usage: SD DVD ‡	
Video Form	nat Quality GOP Extras	
Theorem	at quanty dor extras	
	Mode: Two pass VBR Best 🕴	
Average	Bit Rate: 6.5 Mbps	
	2.0 9.0	
Maximum	Bit Rate: 7.7 Mbps	-
	5.0 9.0	
Motion Est	imation: Best	
Allows up	to 77 minutes/layer of video on DVD-5	

- 10. Mode should be set to Two pass VBR Best. Change the Average Bit Rate to 6.5 and the Maximum Bit Rate to 7.7. Change Motion Estimation to Best.
- 11. The above settings are generally OK but if you want to get more accurate bit rate settings (and better results) see this link for the DVD Bit Rate Calculator.

http://www.videohelp.com/calc.htm

12. Then click on the GOP tab and change the GOP Structure to IP and the GOP size to 6

000	Inspector	
Name:	Selected Target	
Description:	Fits up to 90 minutesFF audio on a DVD-5	
	Encoder	
51 . C		
File Format:	(
Extension:	m2v Allow Job Segmenting	
Stream	Usage: SD DVD ‡	
Video For	mat Quality GOP Extras	
GOP S	itructure: IP 🛟	_
	Open Oclosed	
0	GOP Size: 6 ‡	_
	Pattern: IPPPPP	

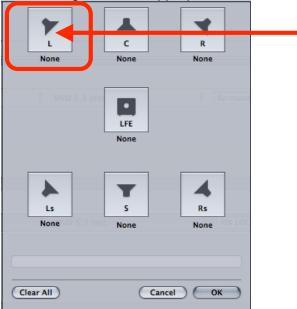
13. Choose the Destination for the mpeg2 file to be saved. Right click "Source" in the "Batch Window" and set the Destination to Source (where it defaults) or other and then save it to another folder if needed.

Sou	Cut	жx	xport Me HDV
	Сору	ЖC	
	Paste	%V	
	Change Setting		
	Clear Setting		
	Destination		Source
	Clear Destination		Desktop
	New Job With Teners C		User's Mov
	New Job With Target C	output	Cluster Sto
			Other
			_

- 14. The next step is to set up the Surround Sound Channels for compression into a Surround AC3 file.
- 15. In the Compressor Batch Window select the "Add Surround Sound" icon



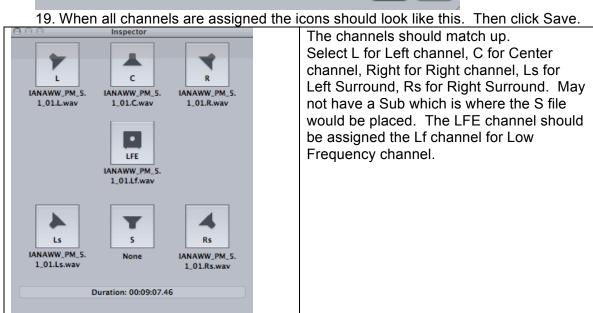
16. The next window that opens will allow the selection of the surround audio files to be assigned to the appropriate channels.



Click on the "Speaker
Icon" for the channel
then browse for and
select the
corresponding
channel then select
"Open" to assign. Do
this for all 6 channels.
May not have a "Sub"
or "S" channel.

- 17. When the icon for the channel is selected a dialog box will ask what file to assign.
- 18. Browse for and select the corresponding channel then select "Open" to assign. Do this for all 6 channels. May not have a "Sub" or "S" channel.

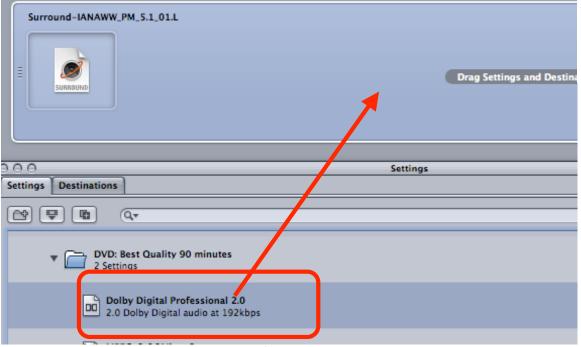
~	Name	A Date Modified
Network	Compressor 5_1 test	6/4/08, 2:56 PM
Macintosh HD	 Compressor 5_1 test DVD 5_1 test 	6/4/08, 3:01 PM
Storage	► 📁 GAY_WW_2trk	12/6/07, 9:38 PM
Storage	IANAWW_PM_2trk_01.wav	12/6/07, 9:37 PM
NO NAME 🔺	ANAWW_PM_5.1_01.C.wav	12/6/07, 9:16 PM
	IANAWW_PM_5.1_01.L.wav	12/6/07, 9:16 PM
Cesktop Desktop	ANAWW_PM_5.1_01.Lf.wav	12/6/07, 9:16 PM
commpower	ANAWW_PM_5.1_01.Ls.wav	12/6/07, 9:16 PM
<u>.</u>	IANAWW_PM_5.1_01.R.wav	12/6/07, 9:16 PM
Applications	IANAWW_PM_5.1_01.Rs.wav	12/6/07, 9:16 PM
Documents	PIX LOCK COMPLETE_audio	12/6/07, 9:43 PM
	PIX LOCK COMPLETE_audio.omf	12/6/07, 1:26 PM
Movies	PIX LOCK COMPLETE.mov	12/6/07, 2:29 PM
🎸 Music		
Pictures		



Clear All

Revert Save

- 20. The Surround entry will be saved in the batch window of Compressor now the AC3 encoding setting must be applied to the Surround file loaded in the Compressor batch window.
- 21. Drag the Dolby Digital Professional 2.0 setting from the "Settings" window and drop it on the "Surround" entry. This will apply the AC3 encoding settings but there are some adjustments that need to be made before encoding.



22. Double click on the Dolby Digital Professional 2.0 setting that was just applied to the surround audio file and the "Property Inspector" will open. Click on the "Encoder" tab to open the encoding settings then click on the "Audio" tab.

000	Inspector		
Name:	Selected Target		
Description:	2 Colby Dight I audio at 192kbps		Encoding
File Format:	Dolby Digital Professional ;		Tab
Extension:			
Audio Co	et System: DVD Video oding Mode: 3/2 (L, C, R, Ls, Rs) Enable Low Frequency Effects ample Rate: 48 kHz ;	Audio Enco	
	Data Rate: 448 kbps 🛟		
	ream Mode: Complete Main ‡ rmalization: -31 dBFS		
	Save As		
	Save AS		

- 23. Change the Target System to DVD Video.
- 24. Change the Audio Coding Mode to 3/2 (L, C, R, Ls, Rs)
- 25. Keep Sample Rate at 48, Data Rate at 448 kbps
- 26. Leave Bit Stream Mode at Complete Main
- 27. Change Dialog Normalization to -31 so that the dialog level doesn't change from the level the mixer set it. -27 or -12 will attenuate the signal by 4 to 19 decibles.
 29. Next slick on the "DitOte on" Taking the Encoder Onthings.
- 28. Next click on the "BitStream" Tab in the Encoder Settings.

000	Inspector
Name:	Selected Target
Description:	2.0 Dolby Digital audio at 192kbps
	E E 6 5 8
	Encoder
File Format:	Dolby Digital Professional
Extension:	ac3 Allow Job Segmenting
Audie	itstream Preprocessing
Cente	er Downmix: 0 dB 🔹
Surroun	d Downmix:
Dolby Sur	round Mode: Not Indicated ‡
	Copyright Exists
	Content is Original
Audio I	Production Information
Peak N	Aixing Level: 85 dB SPL
	Room Type: Small Room, Flat Monitor +
-	
	Save As

- 29. Keep the Center Downmix and Surround Downmix at -3.0db
- 30. Dolby Surround Mode is Not Indicated
- 31. Most material will not need the "Copyright Exists" setting so leave unchecked
- 32. Most material will be original so check the Content is Original box
- 33. Check the Audio Production Information box and change the "Peak Mixing Level" to 85 db SPL
- 34. Choose Small Room, Flat Monitor as Room Type
- 35. Next click on the "Preprocessing Tab" leave everything as shown just make sure that the "Compression Preset" is set to Film Standard Compression

E Encoder	
File Format: (Dolby Digital Professional :)	
Audio Bitstream Preprocessing Compression Preset: Film Standard Compression *	
General: 🗌 Digital Deemphasis LFE Channel: 🗹 Low-Pass Filter	
Full Bandwidth Chan.: 🗹 Low-Pass Filter	
Surround Channels: 90° Phase-Shift	
DC Filter Surround Channels: 90° Phase-Shift	

36. Choose the Destination for the surround audio file to be saved. Right click "Source" in the "Batch Window" and set the Destination to Source (where it defaults) or other and then save it to another folder if needed.

Source	e Cut	жx	xport Me HDV
	Сору	жc	
	Paste	₩V	
	Change Setting		
	Clear Setting		
	Destination		Source <
	Clear Destination		Desktop
	No. 1-1 Web Town Out		User's Mov
	New Job With Target Out	put	Cluster Sto
			Other
			_

37. Click "Submit" and then "Submit" again at this menu.

Name: Export Me HDV2		
Cluster: This Computer	🗧 🗌 Include ur	managed services on other computers
Priority: High	;	
Quitting Compressor will check on the progress of		ion of your batch. Open Batch Monitor to
Dolby Digital Professional 2.0	Mpeg2test	Cancel Submit

38. The file will start to encode to an MPEG 2 that we will use in DVD Studio Pro. To check the status of the encode launch the "Batch Monitor"



39. Click on "This Computer" to show the processes of the encode

🖙 This Computer	Tł	is Computer 1 batch, 1 job	
	• @	Export Me HDV2 Processing 1 job, 2 targets Submitted by kraftsu on 10/24/07 0:17	7:53 elapsed

- 40. Launch DVD Studio Pro.
- 41. Go To DVD Studio Pro > Preferences

DVD Studio Pro	File
About DVD Stud	lio Pi
Preferences	

- 42. Go to the Encoding tab and change the Aspect Ratio to 16:9 HD OR 4:3 SD for non wide screen DVDs
- 43. Change the Field Order to "Top" for HD source material or "Bottom" for SD source material. Mode should be Two Pass VBR
- 44. Bit Rate 6.5 and Max Bit Rate 7.7
- 45. Motion Estimation should be set to Best

					Enc	oaing			
Project	General			Alignment	T Text	Colors	G	Destinations	Encodin
			_	-					
MPEG	-2 SD M	PEG-2 H	ID						
	Aspect Rat	tio: 🔾 4	:3						
		• 1	.6:9 🚽						
		_							
	Sta	art: 00:	00:00:00	Drop I	Frame				
	Field Ord	er: To	p		;	┫-		_	
	Mo	de: 🛛 Tw	o Pass \	/BR	;	╉—		_	
	Dit Do	to:	1.1		65 1	ther			
				-			•		
	Max Bit Ra	ite: 📥	1 1	<u> </u>	7.7 N	lbps 🧹	<u> </u>		
		_							
Motio	n Estimatio	on: Be	st					•	
		G							
		R	eset to F	actory Defai	lts				
_		-	_		-	_			
	Method	d: 🔵 Ba	ckgroun	d encoding					
		💿 En	code on	build					
Apply)							(Cancel)

46. Make a new project

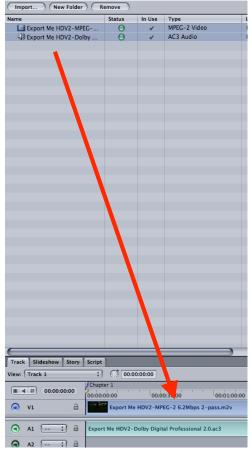
47. Go to Window>Configuration>Extended to change DVD Studio interface



48. Import the MPEG 2 made in Compressor, Quicktime reference file or Quicktime movie into the Assets window



49. Drag the MPEG 2 and the AC3 file or QuickTime from the ASSETS tab to the Track timeline. Audio should match video exactly.



50. Click on the Outline tab (1) next to the Assets tab then click on the UNTITLED_DISC (2)

Assets Outline	1	() () () () () () () () () () () () () (
Ву Туре		
OUNTITLED_D.C	2	
🔻 🧰 Menus	2	
🔙 Menu 1		
🔻 🧰 Tracks		
Track 1		
Elidechows		

51. Then click on the Disc Properties Menu then click on First Play>Menu 1 > Track 1 >Chapter1

000	Disc	
Name:	UNTITLED_DISC	Est. Size: 168 KB
First Play:	✓ Menu 1	:
General	not set	pyright Advanced
0100	Menus 🕨	
DVD Stan	Tracks a [Track] as be	Track 1►
Video Stan	Slide: Chapter 1	AL
	Scripts >	
Streams		

52. Click on the Outline tab next to the Assets tab then click on the Track 1 or Track 2 or the # of the track necessary to set the aspect ratio. The aspect ratio needs to be set for all the tracks in the DVD project so they play correctly and don't look stretched out.

Assets Outline
Ву Туре
UNTITLED_DISC
🔻 🧰 Menus
🔙 Menu 1
🔻 🚞 Tracks
🚍 Track 1 🚽
Slideshows

53. When "Track" is selected the "Tracks Property Inspector" will open and then change the Display Mode to 4:3 for standard definition source material. Change to 16:9 Letterbox for High Definition source material.

	O O O Track
O O Track Name: Track 1 Est. Size: 7.9 N End Jump: not set General Other User Operations Transition	Name: Track 1 Est. Size: 7.9 M End Jump: not set General Other User Operations
Resolution: 720 × 480i Display Mode: 4:3	Resolution: 720 × 480i Display Mode: 16:9 Letterbox
Theyback Options	



56. Once the DVD is built choose Format to burn the DVD

or Desktop. Save to local storage drives.

- 57. Name the DVD Disc
- 58. Click "Choose" to chose the "Current Source" for the DVD



59. Navigate to the location that the DVD VIDEO_TS AND AUDIO_TS folders are stored and click "Choose"

	Choose Source	
	Documents	; Q search
	Name	Date Modified
DMM783057	Sandy Stone.doc	5/7/06, 8:48 PM
twork	Elegant Faxsoftimage.doc	6/2/06, 7:35 AM
	[] 06_250 []	6/12/06, 5:06 PM
	aus92006_0249us1	6/12/06, 5:10 PM
sktop	UTFI invoices	6/16/06, 7:34 AM
	[] 06_0355 []	6/23/06, 6:19 AM
aftsu	AUS920060353US1	6/23/06, 9:45 AM
	AV SAN 01.jpg	6/27/06, 1:41 PM
oplications I	AV SAN 02.jpg	6/27/06, 1:42 PM
	patents	6/28/06, 7:06 AM
ocuments	NSF Proposal 5_8_06	6/30/06, 5:48 AM
	🕨 🧊 desktop gizz	6/30/06, 5:55 AM
ovies	House for Rent 5107 Ave.doc	7/19/06, 9:13 AM
	Microsoft User Data	7/25/06, 2:34 PM
JSIC	Final Cut Pro Documents	7/26/06, 10:56 AM
	Susanne Kraft Help Docs	7/27/06, 1:02 PM
tures	Øvd copy	Today, 6:24 PM
er		Cancel Choose

60. Then click "Burn" to start the DVD burning process

Destination		
Output Device:	MATSHITA DVD-R UJ-835E ;)
	DVD-R Simulation Mode	
	Lossless Linking	
Output Format:	- *	
Total Disc Size: 0.5	59 MB	Cancel Burn
	59 мв DVD into the burner to burn the	
61. Put a blank I		
61. Put a blank I	OVD into the burner to burn the	