Università degli Studi di Firenze



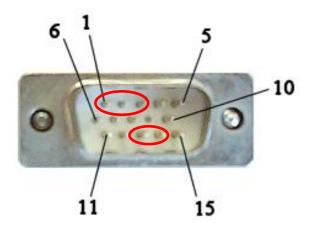


Facoltà d' Ingegneria Dipartimento di Elettronica e Telecomunicazioni

Le porte video VGA e DVI



Segnale analogico

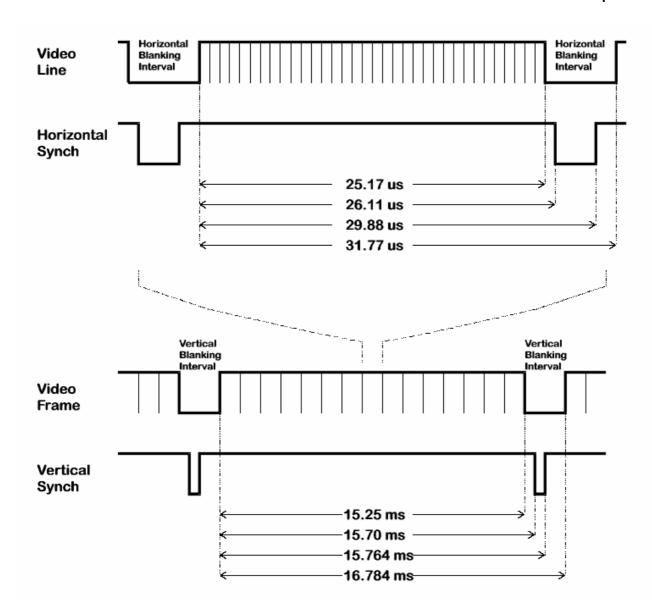




Pin#	Signal Name			
1	Red			
2	Green			
3	Blue			
4	No Connect			
5	Ground			
6	Ground			
7	Ground			
8	Ground			
9	No Connect			
10	Ground			
11	No Connect			
12	DDC DAT			
13	Horizontal Synchronization			
14	Vertical Synchronization			
15	DDC Clock			



A frame of VGA video has 480 lines and each line contains 640 pixels.



Porta video digitale



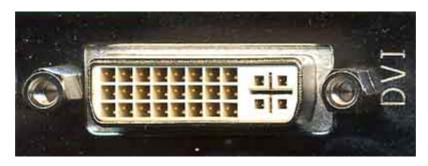
8 bit per ogni colore primario = 256 livelli $256^3 = 16.7$ milioni di colori.

Un'immagine a 1600x1200 (UXGA) x 60 Hz x 8 bit x 3

2.8 Gbit/s

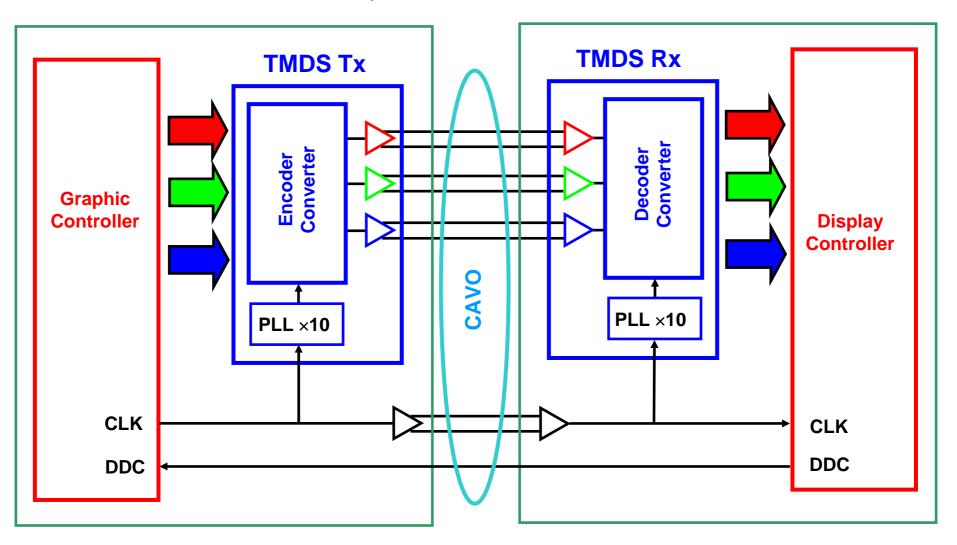


Digital Visual Interface

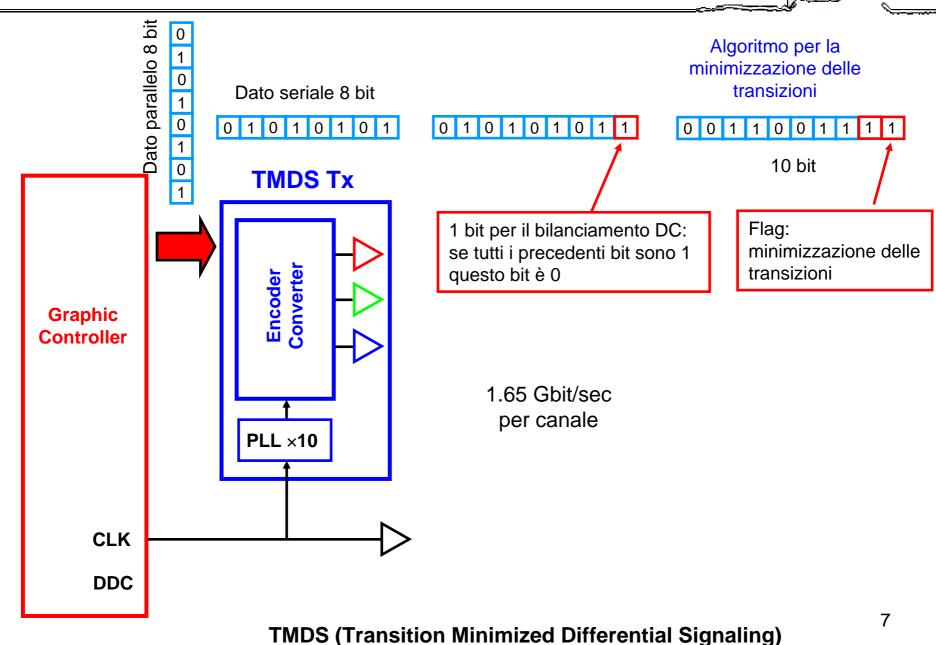




3 porte seriali sincrone

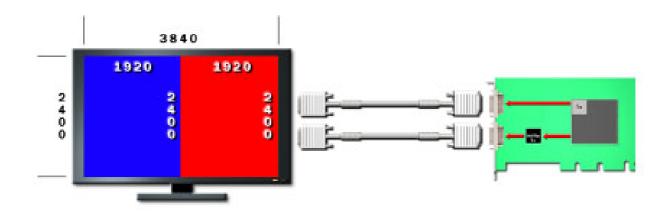


CLK <165 MHz





Dual Link DVI





Segnale digitale



Segnale analogico

Plug & Play

)in	Signal	Pin	Signal	Pin	Signal	
1	Data 2	. 9	—Dma 1-	17	Data 0:	
2	Data 2 +	10	Data 1+	18	Data 0 +	
3	Shield (2 & 4)	11	Shield (1 & 3)	19	Shield (0 & 5)	
4 _	Data 4-	\ 12	Data 3-		Data 5-	
8 1	Data 4 +	13	Bata 3+	21)	Data 6+	
(8)	Clock DDG	_14 (Power+SV	22	Shield Clock	
17	Cata bob	15 (Ground (c) C :	23	Glock +	
3	Analog Vertical Sync	16	HotPlug	24	Clock -	
51	Arialog Red	TMDS PLUG & PLAY ANALOG				
923	Analog Green					
68	Analog Blue					
64	Analog Horizontal Sync					
68	Analog Ground		ANA	LUG		

