

(19) (KR)  
(12) (A)

(51) . Int. Cl. 7 (11) 2002 - 0087359  
H05B 33/22 (43) 2002 11 22

(21) 10 - 2002 - 0026349  
(22) 2002 05 14

2001 05 15 (US)

(71) 343

(72) 14618 754

(74)

(54)

. 2 가 .

5a

1a 1b

2 , ,  
3 , ,  
4 ,  
5a 5b ,  
6 ,  
7 , , - , , ,  
8 , , - , , ,  
9 4 ,  
10a 10b 4 ,  
11 4 ,  
12 5 ,  
13a 13b 5 ,  
14 5 ,  
  
10 : 12 :  
14 : 16 :  
18 : 20 :  
22 : 가 24 :  
26 : 28 :  
30 : 32 :  
34 : 가 36 :  
38 : 39 :  
.

가 가  
가 (CRT), (LCD),  
(viewing surface)

3가 , , 4 , 5 8 . 3가 . 1b  
가 . 1a (10) , . (10) (14)  
(20), (spacer dots) (22), 가 (26),  
가 (28) . . (22)  
(12)

4 , 5 8 (20) (26) , (16)  
. (18) (16) . . (16)  
. (20) (26) . (18)  
가 , , , (stylus) , , ,  
. (28), (26) (22) (20) , (26)  
26)  
, (16) (18) , (18)  
(X,Y) , Application Bulletin  
AB - 158, Burr - Brown, Inc. (Tucson, Arizona) Osgood " Touch Screen Controller Tips"

$$(18) \quad \quad \quad (30) \quad \quad \quad . \quad \quad \quad (16) \quad \quad \quad (30) \\ (32) \quad \quad \quad . \quad \quad (16) \quad \quad \quad (18) \quad \quad (32) \\ (30) \quad \quad \quad (\text{trace}) \quad \quad \quad (18) \quad \quad .$$

(18) 3 , , 가 (34), (36), (38)  
 . 가 (34) , , (X,Y)  
 (X,Y) (39) , ,  
 , Texas Instruments(Dallas, Texas) ADS7846

$$\begin{array}{ccccccc}
 2 & , & , & (36) & - & (40) & (42) \\
 & - & & (40) & & & \\
 & , & & , & , & & \\
 \end{array}$$

1a	(38)	X	(16)	가	가	(34)	(36)
		Y		.	.	,	(18)
(30)		,	,	가	.	(16)	4
,	5	5	, 8		.	8	4
(38)	4		가	(34)	2		.
2	가	.	(38)	5		가	(36)
			1	가	.	(34)	4
			(36)				.

3	1999	8	10	Tang	5,937,272	(OLED)
			(70)			OLED
				(72),		(74),
			(78),			(81)
			(72)	,		(80)
		(74)			OLED	
			(TFT)	(76) 2		(76)
			,			2001
1	30		Feldman		09/774,221	,
			TFT가			
			(system - on - panel)		OLED	(81)
			,	(	,	)
						(VSYNC)
			(HSYNC)			

4 OLED  
가  
D , 2 (12, 72) (82) , (18)( 1a ) (81)( 3 )  
2 (16, 80)

2001 4 4 Siwinski 09/826,194 ,  
가 , 가 , 가 ,  
가 .  
(18)

CMOS

14) (112), (102), (104), (100),  
 , , ,  
 (16)( 1a ) (104), (80)( 3 ),  
 , , ,  
 , , ,

, 3 (112)

6 (112) 가 (126), 가 (34) (38)  
 (112) 가 (120, 122) (104) (X, Y)

124) (126) (124), , , (HSY)  
 NC) (VSYNC) 가 , 50% 가 50%  
 가 , ,  
 (126) HSYNC VSYNC , 3 가 VGA 60 Hz ,  
 30 MHz , VSYNC 60 Hz 가 (126) 가 , HSYNC  
 가 (34) (38) (38) (38) (14)

가 (34) (38) (38) (38) (38) (38)  
 , (112) 가 , , , (104) 4 4 2  
 4 (112) (104) 5 5 4  
 5 (36)( 1a ) (106)( 5a )  
 가 , , ,

7 (112) 가 (126), 가 (34), (38),

(ADC)(40),  
(126), 가 (34), (128)  
7 , (38) 6  
(38)  
(ADC)(40)  
(128) (104)  
(106)( 5a ) (42)( 2 )

(128),  
, (128)  
, (104)  
가  
(immunity)

8 (112) 가  
(ADC)(40), (42), (126), 가 (34), (128), (38),  
(126), 7 (38), (40),  
(128) (42), (42), (128)  
(40) , (100)  
(106)( 5a ) 가  
, (100) (time - to market) 가 가

9 4 (20) 2  
(metal bar : 50, 51) , (50, 51) ITO (54)  
(26) (50, 51) 2 (52, 53) , (52, 53) ITO  
(56) (20) (26) , 가  
(22)( 1b ) ITO 2  
가 ITO 2  
1 , 2 ITO 1 ITO , (16)  
1 ) (18) (36) , 1 , 2 1  
가 . Y , X , (50, 51) 가 , ,  
(52, 53)

4  
5a (14) 10a 10b 10a 10b , , ,  
2) , (110) 4 , , (102) , (10)

$(50, 51, 52, 53)$	$(108)$	$(112)$
--------------------	---------	---------

$$\begin{array}{ccccccc}
 & & 6, 7, 8 & & , & & \\
 (112) & . & & 5 & 4 & (38) & . \\
 2\gamma & & & & & & ,
 \end{array}$$

(38) 4 3 (134, 136, 138, 140) , 2 (142, 144)  
 3 ,  
 . , 3  
 ,  
 2  
 ,  
 11

10a 11 , X/Y (129)가 , 3 (134, 138)가  
, 3 (136, 140) . (120) (50) ,  
(122) (51) . (52, 53) (120 122) .  
ITO (54) , Y 가 . 가 , .  
., (26) ITO (56) . , (52, 53)  
(142, 144) . Y 가 .  
.

12 5 . (20) ITO (64)

4 (60, 61, 62, 63) 4 (60, 61, 62, 63)  
 (16) 4 (16) (66)  
 (26) (68) (65) 가  
 ( ) (20) (26), (65, 66)  
 , (68) (16) 가 ITO , (64)  
 ( ) 4 (60, 61, 62, 63) 가 가 (5V) 가  
 , 4 2 (60) 2 (61, 62)  
 2 (63) (0V) 가 , 2 가 , ITO  
 , 5 (65) (68) ITO (16)  
 가 (64) (65), (18)( 1a )  
 (36)( 1a ) , (X, Y)  
 가

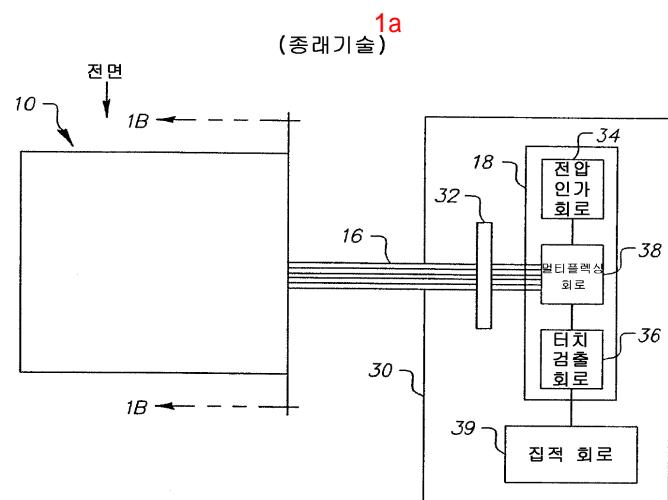
X  
5V가 (62) 가 , 0V (61) 가 , ITO (64) 가 . Y , 5V  
X  
5V가 (62) 가 , 0V (62) 가 . 4 , 5 , 6, 7, 8 , (112)

14	5	가	(34)	가	(34)	X/Y	가	(34)	(38)	(38)	(129)	11	4
.	.	.	.	.	.	.	.	.	.	.	.	.	.
14	,		(38)			(61, 62)				2			(148, 1
50)	.	.	(60)	.	(120)	.	.	.	(63)	(122)	.	.	.
X/Y	,	(129)가				,			(148)		(61)		(120)
ITO	,	(150)				(63)		(122)	,		,	가	Y
(148)	(64)	(61)	(122)	.	X/Y	.	.	가	(150)	(63)	(120)	,	,
,	,	가 X			ITO	,		(150)	,	(65)		.	.
,	,							(40)( )	( )			.	.

(57)

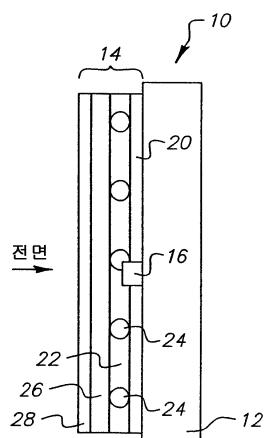
1.

- a) 2 가 ,  
b)  
c)  
d)  
e)



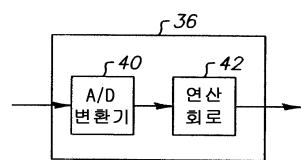
1b

(종래기술)



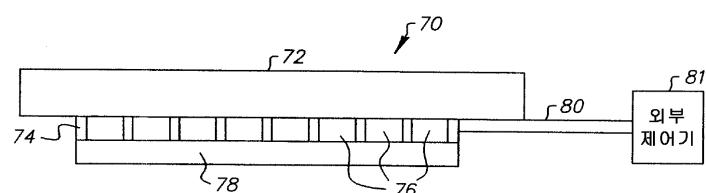
2

(종래기술)

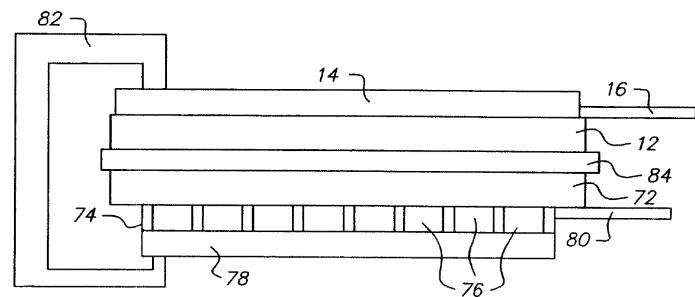


3

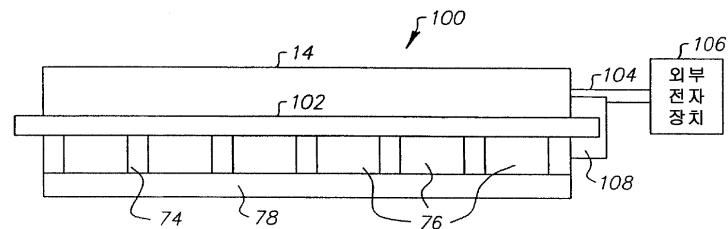
(종래기술)



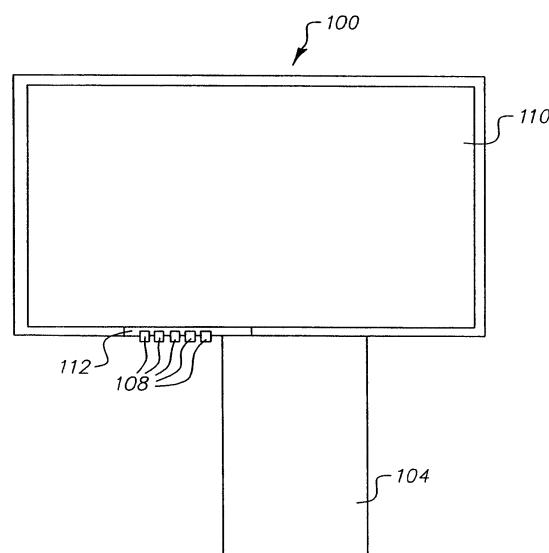
4



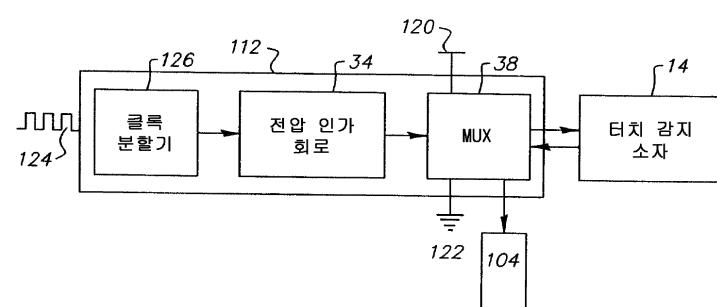
5a



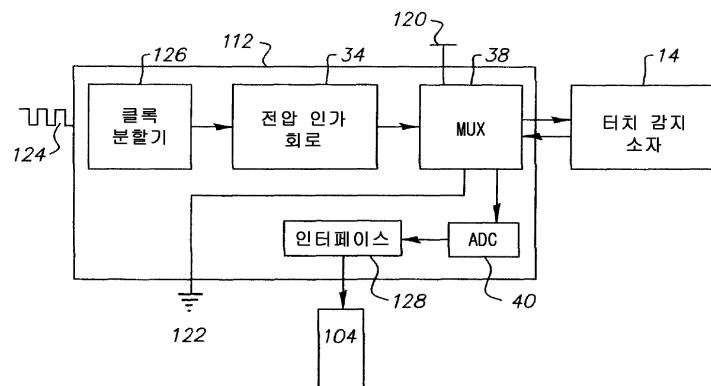
5b



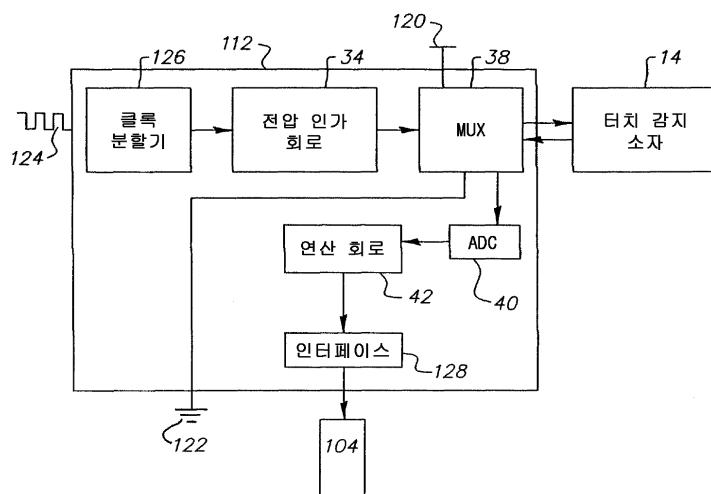
6



7

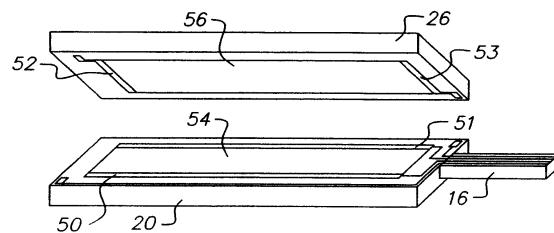


8

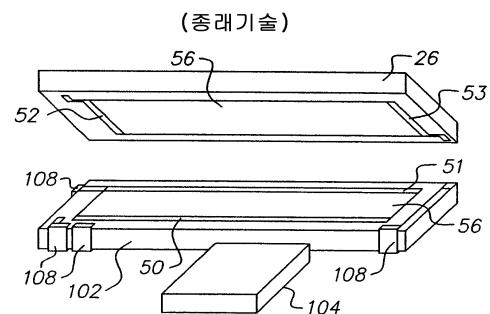


9

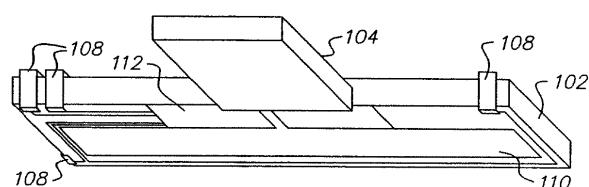
### (종래기술)



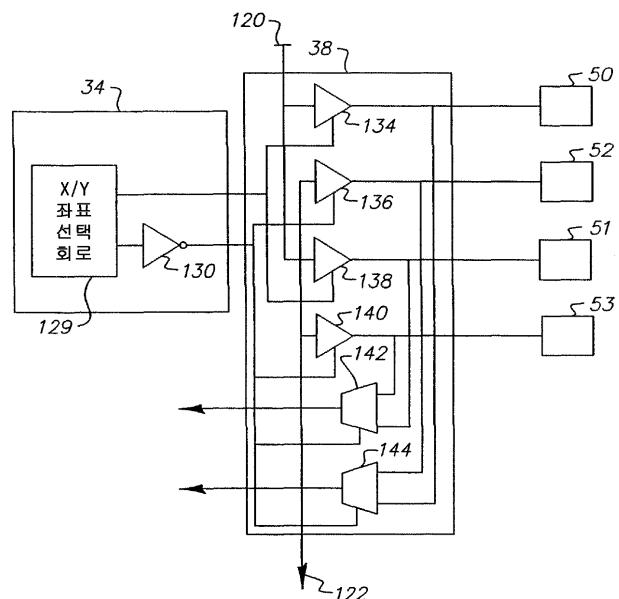
10a



10b

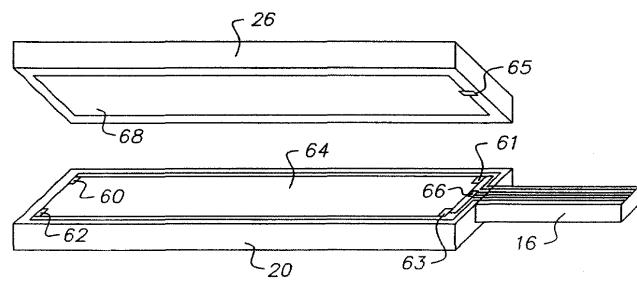


11

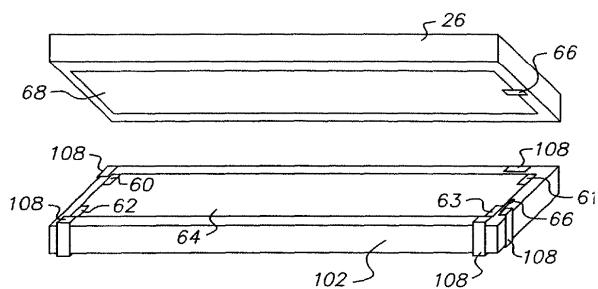


12

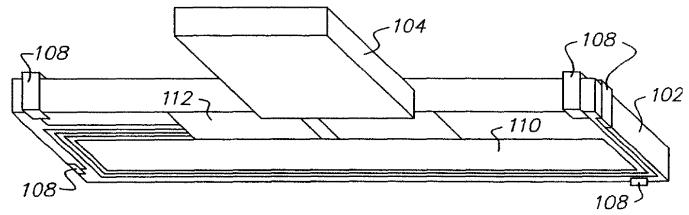
### (종래기술)



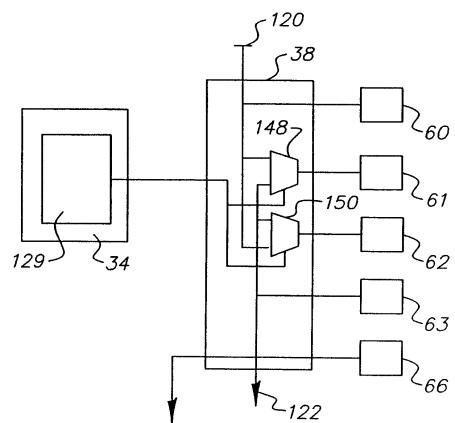
13a



13b



14



专利名称(译)	有机电致发光显示器		
公开(公告)号	<a href="#">KR1020020087359A</a>	公开(公告)日	2002-11-22
申请号	KR1020020026349	申请日	2002-05-14
[标]申请(专利权)人(译)	伊斯曼柯达公司		
申请(专利权)人(译)	柯达公司针		
当前申请(专利权)人(译)	柯达公司针		
[标]发明人	FELDMAN RODNEYD		
发明人	FELDMAN,RODNEYD.		
IPC分类号	H05B33/22 H01L27/32 G06F3/048 H01L51/50 G09F9/30 G09F9/00 G06F3/033 G06F3/041		
CPC分类号	H01L27/323 G06F3/045 H01H2219/037 H01H2219/02 G06F3/0412		
代理人(译)	KIM, CHANG SE KIM , WON JOON		
优先权	09/855452 2001-05-15 US		
外部链接	<a href="#">Espacenet</a>		

#### 摘要(译)

配备有集成触摸屏的有机电致发光显示器包括具有两个侧面的透明基板，形成有源矩阵电致发光显示器的发光层位于基板的一个平面内并通过基板辐射，以及电连接器其连接触敏设备的元件的一个平面内的触摸屏控制器的元件，位于平面内的触摸屏和位于基板和基板的一个平面内的触摸屏控制器的元件在基板的另一侧上的触摸屏装置，只要它与晶体管开关矩阵和基板不同即可。

