

Title (en)

Gas discharge display memory panel.

Title (de)

Gasentladungszeige-Speicherpanel.

Title (fr)

Panneau d'affichage à mémoire à décharge gazeuse.

Publication

EP 0000274 A1 19790110 (EN)

Application

EP 78300079 A 19780626

Priority

US 81174977 A 19770630

Abstract (en)

A gas display panel has improved resolution, colour, memory margin and brightness by using helium based mixtures in a panel structure using evaporated glass technology, e.g., borosilicate glass technology. Multicolour emissions are achieved directly from the helium based mixtures, and additional colour enhancement and selection is accomplished by varying the gas parameters of pressure and dopant concentration and the sustain voltage waveform drive conditions. colour selection from the helium based mixtures with molecular dopants is made using an optical filter or a coloured glass substrate. <??>A gas panel is obtained that emits white light using a helium based mixture doped with oxygen. The mixture is a Penning mixture with optical radiation in the visible part of the spectrum due to systems of emission bands from the ionized oxygen molecules. The first negative system exhibits four strong bands that vary from 75 to 125 ANGSTROM in width and account for green, yellow and red colours. In addition, four weaker bands are conserved for the second negative system which account for the blue colour.

IPC 1-7

H01J 17/20; **H01J 65/04**

IPC 8 full level

H01J 11/12 (2012.01); **H01J 11/50** (2012.01); **H01J 61/12** (2006.01)

CPC (source: EP US)

H01J 11/12 (2013.01 - EP US); **H01J 11/50** (2013.01 - EP US)

Citation (search report)

- [A] FR 2195835 A1 19740308 - OWENS ILLINOIS INC [US]
- [A] FR 2333341 A1 19770624 - IBM [US]
- [A] US 3704386 A 19721128 - COLA RUDOLPH A

Cited by

DE3016808A1

Designated contracting state (EPC)

DE FR GB

DOCDB simple family (publication)

EP 0000274 A1 19790110; **EP 0000274 B1 19820623**; CA 1100563 A 19810505; DE 2861907 D1 19820812; IT 1120101 B 19860319; IT 7824901 A0 19780623; JP S5413256 A 19790131; US 4147958 A 19790403

DOCDB simple family (application)

EP 78300079 A 19780626; CA 299196 A 19780317; DE 2861907 T 19780626; IT 2490178 A 19780623; JP 7333778 A 19780619; US 81174977 A 19770630