

Title (en)

Non-dispersive antenna array and its application to electronic scanning.

Title (de)

Dispersionsfreie Gruppenantenne und ihre Anwendung in einer elektronisch schwenkbaren Antenne.

Title (fr)

Antenne réseau non dispersive, et son application à la réalisation d'une antenne à balayage électronique.

Publication

**EP 0048190 A1 19820324 (FR)**

Application

**EP 81401310 A 19810817**

Priority

FR 8019413 A 19800909

Abstract (en)

[origin: US4356497A] Non-dispersive array antenna of the prism array type in which the primary dispersive input array and the secondary output array include an acute angle  $\alpha$  between each other, made of a piling up of non-dispersive, monodimensional array antennas, in each of which the propagation between said arrays is guided. Application to electronic scanning antennas of the prism array type.

Abstract (fr)

Antenne réseau non dispersive, du type antenne prisme dans laquelle le réseau primaire d'entrée dispersif (I) et le réseau secondaire (IV) de sortie font un angle  $\alpha$  entre eux, réalisée par empilement d'antennes réseau non dispersives monodimensionnelles, pour chacune desquelles la propagation entre lesdits réseaux est guidée. Application aux antennes prismes à balayage électronique.

IPC 1-7

**H01Q 21/00**

IPC 8 full level

**H01Q 21/00** (2006.01)

CPC (source: EP US)

**H01Q 21/0018** (2013.01 - EP US)

Citation (search report)

- [A] US 4187507 A 19800205 - CRANE PATRICK E [US], et al
- [A] US 3045237 A 19620717 - MARSTON ARTHUR E
- [A] US 3524188 A 19700811 - BOWMAN DAVID F
- [AD] FR 2353530 A1 19771230 - WYETH JOHN & BROTHER LTD [GB]
- [A] US 3631503 A 19711228 - TANG RAYMOND, et al
- [A] US 4010474 A 19770301 - PROVENCHER JOSEPH H
- [A] US 3803621 A 19740409 - BRITT P
- [A] PHASED ARRAY ANTENNAS; PROCEEDINGS OF THE 1970 PHASED ARRAY ANTENNA SYMPOSIUM, juin 1970, DEDHAM (US) R.T. HILL: "Phased Array Feed Systems, a Survey", pages 197-211
- [A] PROCEEDINGS OF THE IEEE, vol. 56, no. 11, novembre 1968, NEW YORK (US) E.C. DUFORT: "A Design Procedure for Matching Volumetrically Scanned Waveguide Arrays", pages 1851-1860
- [A] IEEE TRANSACTIONS ON MICROWAVE THEORY AND TECHNIQUES, vol. MTT-16 no. 7, juillet 1968, NEW YORK (US) G.T. ROOME et al.: "Thin Ferrite Devices for Microwave Circuits", pages 411-420

Cited by

US5039994A; GB2171257A; GB2123215A

Designated contracting state (EPC)

DE GB IT NL SE

DOCDB simple family (publication)

**EP 0048190 A1 19820324; EP 0048190 B1 19850130**; DE 3168637 D1 19850314; FR 2490026 A1 19820312; FR 2490026 B1 19821001; US 4356497 A 19821026

DOCDB simple family (application)

**EP 81401310 A 19810817**; DE 3168637 T 19810817; FR 8019413 A 19800909; US 29964681 A 19810904