Title (en)

WHIP ANTENNA

Publication

EP 0403741 A3 19910529 (DE)

Application

EP 90105964 A 19900329

Priority

DE 3919884 A 19890619

Abstract (en)

[origin: EP0403741A2] The invention is based on the object of developing a known rod- shaped radio antenna, which does not have an approximately circular omnidirectional characteristic when arranged obliquely, such that the antenna operates as an antenna with gain, with a largely circular characteristic, at an inclination angle deviating from the vertical by up to 40 DEG . <??>This object is achieved by an elastic rod (12) of dielectric material being fixedly connected to a spring element (11) and carrying a plurality of coils (SP1 ... SP4) and a radiating part (13). Together with the spring part (11), a first coil (SP1) which is electrically connected to the said spring part (11) has a first length L1 = lambda /4. A second coil (SP2), connected to the first coil (SP1), has a length L2 = lambda /4. A third coil (SP3) is wound running backwards from the end of the second coil (SP2) and has a length L3 = lambda /8. A fourth coil (SP4) is wound from the end of the third coil (SP3) parallel to the second coil (SP2). A radiating part (13), having a length L4 = 3/8 lambda , is connected to the fourth coil (SP4). In this case, lambda is the mean operating wavelength of the relevant radio band. <??>A preferred area of application for the rod-shaped radio antenna is the Radio Network C of the German Federal Post Office. <??>The drawing shows a winding layout for the rod-shaped radio antenna. <IMAGE>

IPC 1-7

H01Q 9/32

IPC 8 full level

H01Q 9/32 (2006.01)

CPC (source: EP US)

H01Q 9/32 (2013.01 - EP US)

Citation (search report)

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EP 0403741 A2 19901227; **EP 0403741 A3 19910529**; **EP 0403741 B1 19940601**; AT E106612 T1 19940615; DE 3919884 A1 19901220; DE 3919884 C2 19940519; DE 59005882 D1 19940707; DK 0403741 T3 19940919; US 5061942 A 19911029

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