

OPEN POSITION: RF/MICROWAVE ENGINEER

ALCAN Systems is a rapidly growing start-up company headquartered in Darmstadt, Germany. ALCAN's patented technology, based on using liquid crystals as tunable material, enables ultra-thin, lightweight flat panel antennas that can track satellites fully electronically without the need for any moving parts. ALCAN R&D team works on anything and everything related to phased array antenna design & prototyping: LC based phase shifters and amplitude tuners, RF planar & waveguide structures, polarization agile structures, receive and transmit antennas, and active microwave circuits.

We are thrilled to be opening our first design house outside of Germany in Istanbul. ALCAN Systems Türkiye is looking for enthusiastic individuals to join our team to work towards realizing the full potential of these smart antennas and help us meet our ambitious goal of making broadband connection accessible to every person on the planet.

JOB DESCRIPTION

As **RF/Microwave Engineer** at ALCAN Systems Türkiye, you will be responsible for designing and building the hardware that will bring broadband connection to every moving vehicle in the world. Working closely with our R&D teams in Germany and Turkey, you will have a key role in developing and realizing ALCAN's groundbreaking, liquid-crystal-based, smart flat panel antennas.

We have three full-time openings for **RF/Microwave Engineer** position in Istanbul, Turkey. In particular, we are looking for candidates specialized in at least one of the following three topics:

Planar, passive microwave structures: transmission lines, transitions between planar and waveguide structures, antennas

Waveguide structures: power dividers, transmission lines, transitions between planar and waveguide structures

Antenna arrays: flat panel antennas and antenna arrays, array topologies, antenna subsystems
ALCAN offers a comprehensive benefits package, including private healthcare coverage, relocation assistance and competitive salary. Candidates with extensive experience will be considered as **Senior RF/Microwave Engineer**.

Key Responsibilities

- Design, simulate and prototype planar antenna arrays, transmission line structures, feed networks, transitions, operating at Ku-band, Ka-band and beyond 60 GHz
- Contribute to different aspects of the integration of the radiating elements, feed networks and other RF/Microwave subsystems into the liquid-crystal-based smart antenna
- Investigate and build upon the current state-of-the-art to propose new concepts on planar arrays, waveguide-microstrip transitions, feed networks
- Follow a new design idea from concept to prototyping, development, test and eventually to final product
- Improve the performance of our existing designs by proposing alternative solutions and implementing them

- Contribute to system specifications definitions, evaluate impact of specifications on hardware design (time, cost, complexity)
- Execute hardware tests, troubleshoot any issues and deliver solutions

About You

- BSc or MSc degree in Electrical-Electronics Engineering
- 5+ years experience in RF/Microwave hardware design and development
- Track record of producing innovative solutions, successful hardware releases (patents are a plus)
- Ability to think outside the box and to come up with new solutions
- Ability to adapt quickly to rapidly changing technical priorities
- Solid understanding of transmission line theory, guided waves, radiating elements and arrays
- Ability to analyze trade-offs between performance, manufacturability, cost and user experience
- Ability to work collaboratively in a cross-functional and cross-disciplinary team environment
- Proficiency in at least one of the following simulation tools: ADS, CST Microwave Studio, HFSS, AWR Microwave Office
- Working fluency in MATLAB or Python

Preferred Qualifications

- Solid understanding of phased array theory and electronically steerable arrays
- Demonstrated practical experience on design, test, troubleshooting of RF/Microwave circuits and systems
- Experience in design and implementation of electronically tunable RF components
- Experience with RF test instruments and setups such as VNA, spectrum analyzer, anechoic chamber, etc.
- Experience with satellite or point-to-point communication technologies

Please send us relevant documents via e-mail: kariyer@alcansystems.com