# Passionate about people and passionate about space



**HE Space** is a successful international space company. For 40 years, we have been supporting our customers with qualified experts in the field of engineering, science and administration. HE Space has joined forces with CS Group to lead the engineering and digital space market in Europe and to provide highly skilled consulting.

# **Galileo System Requirements Engineer**

### **Key Tasks and Responsibilities**

This activity is related to provision of system requirements (UNCLA and CLA) including security aspects and covers the requirements management process throughout their entire lifecycle, namely:

- Input service/mission requirements analysis and validation (done at level N);
- Lower-level requirement definition and allocation including justification (flow down to level N-1);
- Requirement maintenance including higher level requirements evolutions and follow up of RFDs/RFWs generated during the infrastructure development and qualification;
- Traceability and compliance status "as specified", "as designed" and "as built" of level N-1 requirements vs level N requirements.

### The engineering process is triggered when (but not limited to):

- New/evolution of Service/Mission/Security Requirements is made available;
- Changes initiated by the needs of improving Service/System/Security availability/continuity
  following lesson learnt from REX (RAMS analyses, major anomalies, system robustness
  analyses and resilience tests);
- Evolutions required to solve specific obsolescence issues and requiring impact analysis;
- Evolutions System/Segment/Element requirements needed to improve system operability for service provision (operability improvements);
- Evolution of the infrastructure necessary to improve security (e.g. robustness to penetration tests).

### Preliminary input requirement analysis

As preliminary work to allow proper generation of lower-level requirements the contractor shall:

- Review of the input (higher level requirements) to get a satisfactory understanding of the
  expected needs at lower level (N-1). Requirements which are incomplete, ambiguous or
  contradictory shall be identified and support provided to allow their timely resolution;
- Consolidate a synthesis of system needs related to the provided inputs;
- Identify any constraints (e.g. limits of applicability) related to each specific higher-level requirement and propose alternative formulations;
- Integrate the results of the above analyses for subsequent processing.

### Requirements definition, allocation and justification

As preliminary work to allow proper generation of lower-level requirements the contractor shall:

# Passionate about people and passionate about space

- Review of the input (higher level requirements) to get a satisfactory understanding of the
  expected needs at lower level (N-1). Requirements which are incomplete, ambiguous or
  contradictory shall be identified and support provided to allow their timely resolution;
- Consolidate a synthesis of system needs related to the provided inputs;
- Identify any constraints (e.g. limits of applicability) related to each specific higher-level requirement and propose alternative formulations;
- Integrate the results of the above analyses for subsequent processing.

### Requirements definition, allocation and justification

The following system requirements elaboration and allocation activities shall be performed in close interaction with the system design activities (several interactions maybe needed):

- Define functional requirements: the higher-level requirements (defined at level N) are allocated to functional requirements at lower level (level N-1). The allocation process is iteratively carried out in parallel to functional and physical architectural analyses.
- Define performance requirements: the higher-level performance requirements are allocated at lower level considering the allocation already available for other parts of the system contributing the final performances. Requirements to be flowed down to the operator to ensure performance requirements are met (e.g. Mean Time to Repair an equipment) shall be identified as well.
- Inclusion of non-functional requirements or design drivers: Existing direct requirements (e.g. some design constraints) are allocated to the applicable level without tailoring, including logical/physical architectures.
- Identification of requirement status (i.e. under procurement, confirmed by design at PDRs/CDRs, confirmed by analysis/test at CDRs/QRs), produce traceability and SoC controlled.
- Definition of the verification method and verification milestone for each requirement produced (input to RVM).
- A requirements justification file is produced for the initial set of requirements and then maintained for subsequent evolutions.
- The requirements baseline (From level N to level N-m) shall be put and maintained in DOORs, including SoCs and justification files.

### **Skills & Experience**

You will have the following qualifications and relevant experience:

- Bachelor's in aerospace engineering or a relevant discipline;
- 4 years of experience in navigation (EGNOS, Galileo etc);
- Experience is Galileo is an advantage;
- Customer focus mentality;
- Fluency in English is mandatory; knowledge of another European language is an advantage.

This job is located in **Prague or Toulouse**.

If you think you have what it takes for this job, please send your CV (in English and in Word or PDF) to Kalina Traykova, by clicking on the button "Apply for this job" quoting job **CZ-HP-25022.** 

An exciting and dynamic international working environment awaits you!

# Passionate about people and passionate about space