System-Related Development Achievements (as of June 2024)

Developed Systems and Software	OS	Programming Languages	DB	Development Tools
Mission Operations Planning System for Earth Observation Satellites	Cent OS Windows	Java Excel VBA	PostgreSQL	Eclipse
Observation Request Reception System for Earth Observation Satellites	UNIX	Java Python	PostgreSQL	Eclipse
Satellite Operation Planning System	Windows	Java	—	Eclipse
Orbit Calculation Software	Windows	Java	—	Eclipse
Satellite Control System • Satellite Control Unit • Telemetry Collection and Distribution • Satellite Data Analysis • Satellite Database Management • Controller Training, etc.	Windows Linux	Java	PostgreSQL Fess Elasticsearch	Eclipse Scene Builder Subversion Enterprise Architect Astah Jenkins Virtual Box MyBatis
Ground Station Management System	Windows	Java	—	Eclipse
Ground Station Reservation System	Windows	Python Go	—	Eclipse
Sensor Product Provision System	Windows, Cent OS	Python	PostgreSQL	QGIS VS Code Virtual Box Vagrant GitLab AWS s3 Min IO

Developed Systems and Software	OS	Programming Languages	DB	Development Tools
Satellite GN&C (Guidance, Navigation and Control) Simulator	Windows	Java Python	—	Eclipse Ubuntu PyCharm
Inter-Satellite Ranging Mission Planning System for Positioning Satellites	Linux	Java	—	Eclipse Git
GPSR (GPS Receiver) Data Transformation	CentOS Windows	Java	—	Eclipse
Satellite Positioning Ionospheric Delay Analysis Tool	Windows	C	—	MATLAB
Closed Ecological Life Support System (CELSS) Simulation Software for Lunar and Mars Bases	UNIX Windows	Java	Oracle	Eclipse
QOL (Quality of Life) Measurement and Observation System	Windows	Python	—	Eclipse Ubuntu
Disaster Prevention Planning Support Simulator	Windows	Java	—	Eclipse
Ship AIS (Automatic Identification System) Planning Tool	Windows	Java	—	Eclipse
Satellite Image Processing System	Windows	Java	—	Eclipse
Development Support for Spacecraft Systems Using MBSE (Model-Based Systems Engineering)	Windows	Python	—	CAMEO STK MATLAB
Meteorological Disaster Information, Hazardous Slope Monitoring, Web-Based Water Pipeline Data Management, Point Cloud Data Analysis, Bid Information Database, Defect Aggregation / Summary	CentOS	Python C# JavaScript HTML PHP	SQLite3	VisualStudio Code QGIS Unity
In-Orbit Satellite Imagery Visualization Tool	Windows	Java	—	Eclipse