FINNISH SPACE INDUSTRY DAYS 2019

4TH & 5TH APRIL 2019
HELSINKI

THALES ALENIA SPACE

JEAN-JACQUES JUILLET

06/03/2019
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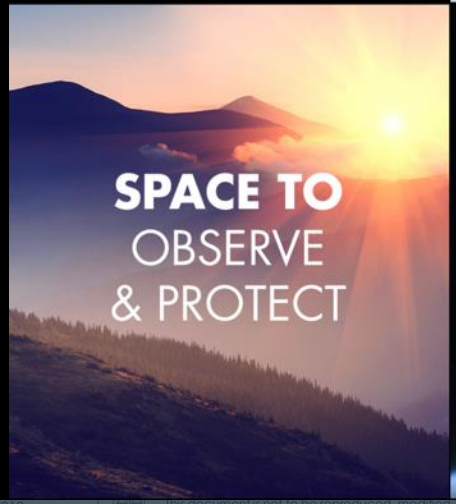
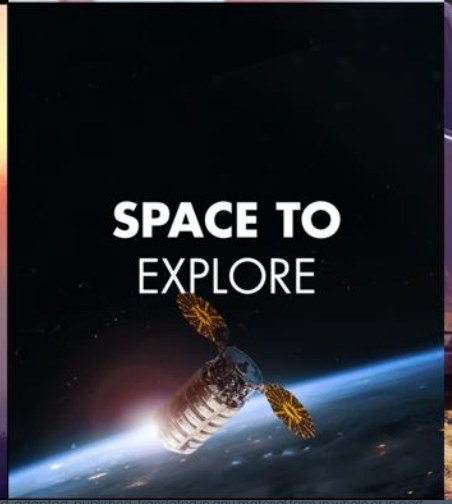
SPACE FOR LIFE ///





06/03/2019
04/04/2019
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A FEW NUMBERS

JOINT VENTURE

THALES (67%)
LEONARDO (33%)

SALES

2.5 BN€ IN 2018

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A FEW NUMBERS

MORE THAN

8,000 EMPLOYEES

17 SITES

WORLDWIDE

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OUR EUROPEAN INDUSTRIAL FOOTPRINT

14 SITES IN EUROPE

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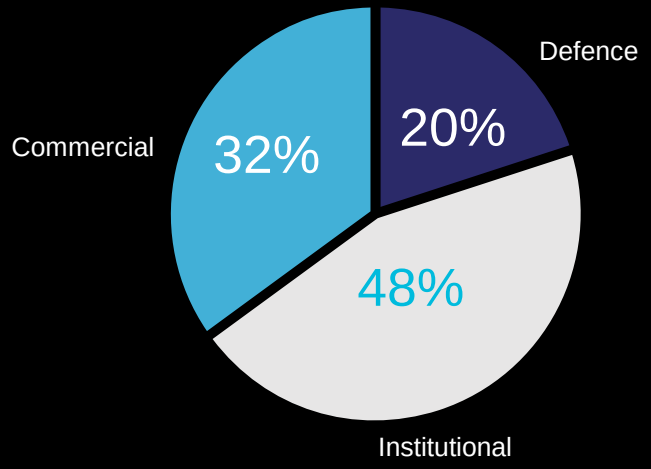
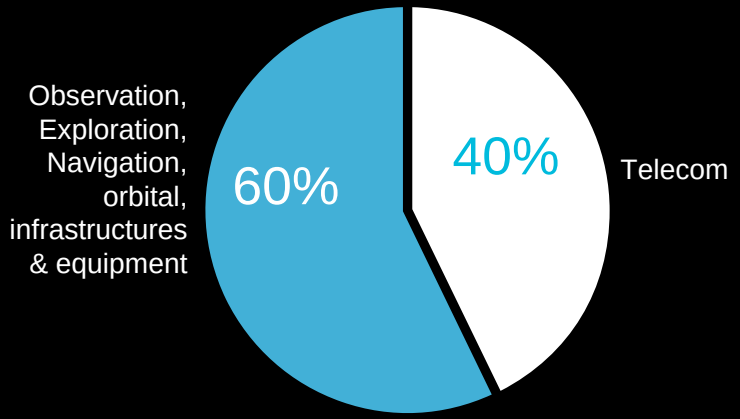
A FEW NUMBERS

BREAKDOWN PER MARKET*



BREAKDOWN PER ACTIVITIES*



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A SELECTION OF CUSTOMERS AS OF DECEMBER 2018

SCIENCE & EXPLORATION

ASI: ITALIAN SPACE AGENCY — CNES: FRENCH SPACE AGENCY — ESA: EUROPEAN SPACE AGENCY — ESTEC: EUROPEAN SPACE RESEARCH & TECHNOLOGY CENTRE — NASA — RUSSIAN FEDERAL SPACE AGENCY — UK SPACE AGENCY

OBSERVATION, METEOROLOGY & ENVIRONMENTAL MONITORING

CNES — ESTEC — EUMETSAT: EUROPEAN ORGANISATION FOR THE EXPLOITATION OF METEOROLOGICAL SATELLITES — ESA — EUROPEAN UNION — FRENCH GOVERNMENT — ITALIAN GOVERNMENT — NPO LAVOCHKIN — SOUTH KOREA — EUROPEAN COMMISSION

TELECOM OPERATORS

ARABSAT — AVANTI COMMUNICATIONS — EUTELSAT — HISPASAT — INDOSAT INDONESIA — INMARSAT — ISS-RESHETNEV — KOREA TELECOM — MINISTRY OF INFORMATION BANGLADESH — MINISTRY OF TRANSPORTATION & TELECOMMUNICATIONS OF TURKMENISTAN — PT TELKOM INDONESIA — RSCC: RUSSIAN SATELLITE COMMUNICATION CORPORATION — SES GLOBAL — TELEBRAS — YAHSAT

SATELLITE CONSTELLATION OPERATORS

GLOBALSTAR — IRIDIUM — LEOSAT — O3B — TELESAT

MILITARY SATELLITE COMMUNICATIONS

BRAZIL — FRANCE — GERMANY — ITALY — KOREA

NAVIGATION

CLS — EUROPEAN GLOBAL NAVIGATION SATELLITE SYSTEMS AGENCY — ESA — EUROPEAN UNION — KOREA AEROSPACE RESEARCH INSTITUTE (KARI)

SATELLITE INTEGRATORS

AIRBUS DEFENSE & SPACE — BALL AEROSPACE & TECHNOLOGIES — MAXAR — MITSUBISHI

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WHAT MAKES US DIFFERENT?

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THALES ALENIA SPACE INTERNAL

OUR TASTE FOR PERFORMANCE

We have been delivering **high-quality technologies** to some of the world's most demanding customers for decades — a sure sign of **our culture of commitment, partnership and responsiveness.**

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OUR DIGITAL TRANSFORMATION

Digitalization is allowing us to make **smarter** and **more flexible** satellites.

Our customers benefit from the new solutions emerging from our **agile and empowered teams**.

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THALES ALENIA SPACE INTERNAL

OUR PARTNERSHIP APPROACH

CUSTOMERS & SUPPLIERS

Success for complex projects such as ours can only be achieved by collaborating all along the value chain.

NEW SPACE

Our work in the “New Space” paradigm

We are already working with new partners on smaller, competitively-priced satellites that enable a wide variety of applications for Earth Observation, Telecoms and the Internet of Things.

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WORLDWIDE LEADERSHIP

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TELECOMMUNICATIONS: FLEXIBLE SATELLITES, INNOVATIVE PAYLOADS

MASTERING CUTTING-EDGE TECHNOLOGIES TO DELIVER FIRST CLASS SOLUTIONS

TURNKEY SOLUTIONS

HIGH PERFORMANCE, RELIABLE AND FLEXIBLE SPACEBUS SATELLITES FOR BROADCAST, BROADBAND AND DUAL-USE MISSIONS

- SPACEBUS NEO modular product line with a fully electric version
- From 3t to 6t satellite class embarking from 5 to 20 kW payload mission in all frequency bands from L to Q/V bands

AFFORDABLE AND VERSATILE LEO/MEO ELITEBUS™ PLATFORM FOR CONSTELLATIONS

FLEXIBLE AND INNOVATIVE PAYLOADS FOR HIGH PERFORMANCE MISSION, MAKING THE BEST USE OF EACH MHZ OF SPECTRUM

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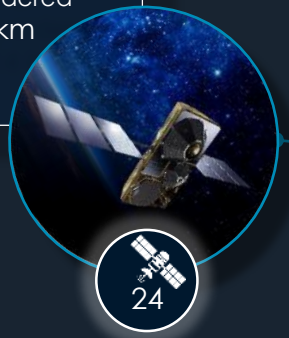
WORLDWIDE LEADER FOR CONSTELLATIONS

MASTERING CUTTING-EDGE TECHNOLOGIES TO DELIVER FIRST CLASS SOLUTIONS

Globalstar

Globalstar 2
24 Satellites ordered
ORBIT 1 414 km

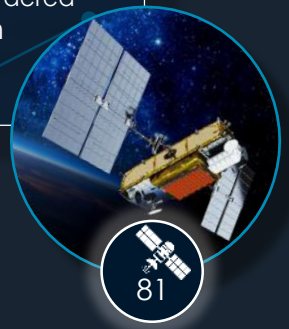


SES
beyond frontiers

O3b
20 Satellites ordered
ORBIT 8 069 km

iridium

Iridium NEXT
81 Satellites ordered
ORBIT 780 km



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SPACE-BASED DEFENCE AND SECURITY SYSTEMS

READY TO SERVE THE NEW NEEDS OF EUROPE AND THEIR ALLIES

EXPERIENCED IN ALL FIELDS OF DUAL-USE AND MILITARY SPACE

MILSATCOM

SYRACUSE 1/2/3/4, Sicral 1 & 2, Athena-Fidus, Satcom Bw

SURVEILLANCE AND IMAGERY INTELLIGENCE

COSMO-SkyMed 1st & 2nd generation, Helios 1 & 2, CSO, Pleiades, MUSIS UGS, Falcon Eye, Göktürk, MOHAMMED VI-A and VI-B Satellites

ELECTROMAGNETIC INTELLIGENCE

CERES

EARLY WARNING FOR BALLISTIC MISSILE DETECTION

Spirale and Follow-On

POSITIONING DATA COLLECT

Maritime cooperative surveillance (AIS), Argos

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SHAPING NAVIGATION SYSTEMS

LINKING TECHNOLOGY TO MARKETS

EGNOS/ KASS

Satellite based augmentation system prime
Aeronautical Positioning Integrity service over Europe (EGNOS) and South Korea (KASS)

GALILEO

End-to-end system design and integration leader
Ground Mission Segment prime

POSITIONING DATA COLLECT

Argos NEO/MEOLUT Next/GRICAS
Road User Charging

AERONAUTICAL SECURED COMMUNICATIONS

KINEIS

A 20-nanosatellite constellation built by Thales Alenia Space as prime contractor on behalf of CLS, will link millions of objects to the Internet by 2030.

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CLIMATE CHANGE MONITORING

OPTICAL AND RADAR TOP OF THE CLASS CAPABILITIES

PRIME CONTRACTOR FOR ALL EUROPEAN METEOSAT METEOROLOGICAL SATELLITES

CONTRIBUTION TO ALMOST EVERY EUROPEAN CLIMATE-RELATED MISSION

WORLD LEADERSHIP IN OPERATIONAL OCEANOGRAPHY

A UNIQUE EXPERTISE IN ATMOSPHERIC SOUNDING

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UNDERSTANDING AND EXPLORING THE UNIVERSE

KEY EUROPEAN PARTNER FOR INTERNATIONAL COOPERATION

A PRIME ROLE IN ALL MAJOR EUROPEAN EXPLORATION MISSIONS

EXOMARS
European Premiere in landing/search for life on Mars

CASSINI/HUYGENS, ROSETTA, MARS & VENUS EXPRESS

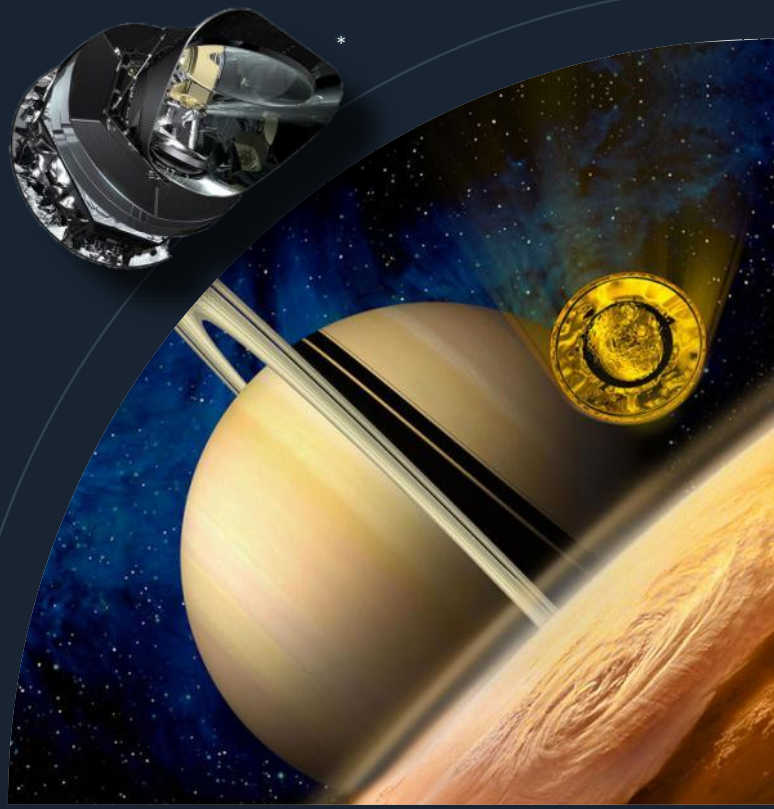
HERSCHEL & PLANCK

BEPI COLOMBO

EUCLID

ESA atmospheric re-entry technology demonstrator and experimental vehicle

A STRONG POSITION IN ENABLING TECHNOLOGIES FOR HUMAN AND ROBOTIC EXPLORATION



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