The IRIDEOS project
The new Italian ICT hub which aggregates and consolidates some operators in B2B market

F2i SGR (Fondi italiani per le infrastrutture) is the largest infrastructure fund operating in Italy and is among the principal funds in Europe. F2i has already invested about €5 billions in domestic infrastructures (airports, gas distribution, water services, renewable energy). In telecommunications F2i acquired Metroweb in 2011 then sold to OpenFiber at the end of 2016.

Marguerite (the 2020 European Fund for Energy, Climate Change and Infrastructure), was established with the backing of the European Commission and six Europe’s leading public financial institutions to make capital-intensive infrastructure investments within the EU.
Key Numbers

€ 194M
core revenues 2019

+700
employees

+155
operators, ISP e OTTs hosted
Targeted to business market

**Carriers, Over The Top**
- A complete offering of services specifically suited to operators, internet service providers and “Over The Top”
- For national and international customers

**Small and medium-sized companies**
- Integrated services and "ready to use" solutions for small offices and medium sized companies
- The same support services dedicated to "large-sized companies"

**Large-sized companies**
- Customized and flexible solutions
- Certifications

**Public Administration, Utilities & Healthcare**
- Specific solutions for the public sector
- Certifications
IRIDEOS: an integrated operator
Unique positioning to support companies in their digital transformation

Full control of Infrastructures to guarantee QoS

Wide range of services
telecommunication, housing, cloud, IT management

Internal management skills
to create and manage complex systems, combining IT and TLC
Main infrastructures

Data Centers
Connected with proprietary fiber optic.
Interconnection with the main
backbones and national & European
NAPs
> 14 data centers
> Milan, Rome, Verona, Trento

Cloud factory
> Three proprietary cloud platforms
> Agid certifications
> Strong knowledge of cloud transformation

Fiber Optics
National backbone, proprietary urban network, international network
> 30,000 km backbone
> 5,000+ access points to the fiber along the motorways
> 5,885 Km MANs in the main cities
> 60 PoP in other 15 Countries

Avalon Campus
The largest Italian private Internet hub
> in Milan Caldera
> 155 interconnected operators
> 11,000 fiber optic links settled

S.O.C. (Security Operation Center)
> Coverage h24x365
> Monitoring, detection and reaction functions
> Anti-DDoS
> Use of "best of breed" technologies
(fully operational from April 2020)
Services integration and customized solutions, even in full outsourcing
Infrastructures and Platforms
Network
Fiber network along the motorways and international presence

- 30,000 km fiber network along motorways and the Adriatic backbone
- 5,885 Km MAN in the main cities
- 5,000 access points to the fiber
- FTTx and xDSL services in all Italian cities

Interconnected with the main European Internet Exchanges

- 60 PoPs in 15 other Countries
- Transit services, local connectivity
Data Centers

15 data centers, strong presence in Milan Caldera

**Milan**
- [Avalon Campus incl.]
- 9 Data centers
- 8.900 sqm
- 25 rooms

**Rome.Tiburtina**
- 3 Data centers
- 1.000 sqm
- 5 rooms

**Verona.Brennero**
- 1 Data center
- 500 sqm
- 1 room

**Trento.Dolomiti**
- 1 Data center
- 425 sqm
- 7 rooms

MIX POP in meet-me-room

Privileged access to energy sources

Cloud Providers Interconnections
- Microsoft Express Route
- AWS Direct Connect
- Oracle Fast Connect
- Google Cloud Interconnect
- Salesforce Express Connect
- City Cloud Connect
- IBM Direct Link
- Tencent Direct Connect
- Alibaba Cloud
Avalon Campus

The largest Italian hub for neutral colocation

The biggest data center in Milan Caldera:
- 8,900 sqm available
- 25 rooms
- Caged spaces and private suite

Direct access to the Internet backbone:
- 2 separate fiber accesses
- POP MIX in room

The largest point of interconnection to the Italian Internet:
- 155+ operators hosted
- 5+ top worldwide cloud provider
- National & International Content Delivery Network
Three Cloud platforms
High performance and solutions for every need

V. Cloud
- Suitable for high performance stable loads
- High performance storage (up to 1M IOPS)
- Disaster recovery "Zerto based"
- High reliability thanks to the infrastructure distributed on 3 interconnected data centers

O. Cloud
- Suitable for high performance dynamic loads
- Multiregion: Milan, Frankfurt, Amsterdam
- It supports microservices architectures and DevOps Cloud Automation

S. Cloud
- Specific for SAP Hana
- High reliability included
- Migration projects from in-house environments available
- SAP management services (Option)

Certifications:
- SAP® Certified in SAP HANA® Operations
- SAP® Certified in Hosting Services
- SAP® Certified in Cloud and Infrastructure Operations

Hundreds of companies "already on board" and thousands of applications always running
Voice platforms integrated with fiber network and data centers

State-of-the-art telephone exchanges distributed throughout the territory

Two new-generation telephone exchanges in geographical redundancy

Servizi
Voip | Cloud PBX | Unified Communications | Traffic termination
Services
Connectivity
The best network solutions in Italy and abroad

Fibra dedicata
- Fiber-based infrastructure of entire industrial areas / tourist districts.
- Dedicated high speed solutions for companies.

Fttc & Ftth
- Full coverage of Italian territory.
- Speed up to 200Mb/s for copper connectivity and up to 1Gb/s for fiber links.

xDSL
- Full coverage of Italian territory.
- Speed up to 20Mb/s for symmetrical and asymmetrical connections.

SD-Wan | VPN/MPLS managed

Wireless
- Project radio tower.
- Coverage up to 30Mb/s in Bergamo.
- 3G/4G backup available in Italy.

Backbone
- Transport λ 1/2,5/10Gb/s.
- Coverage along the main Italian motorways and the Adriatic backbone.

International
- "Local queues" in xDSL or fiber optics technologies in the majority of Countries.
- 60 POPs in other 15 Countries.
Data Center

In the heart of Internet

Telehouse
- Avalon Campus, Milan, in via Caldera
- Specific for operators e OTTs
- Spaces and cages customized
- Precabling and "meet me room" distributed for easy interconnections

Housing
- Available in Milan, Rome, Verona, Trento
- Spaces available in units, ½ rack, full racks
- Internet connectivity and static IP
- Redundant Lan and "RAC" connections

Options

Storage as a service
- NAS or SAN
- SAN with "Snapshot", "Clone" or "Remote Protection" options
- Capacitive NAS or HNAS

Backup as a service
- Reliable and customizable
- Deduplication
- Purchasable in small quantities and modifiable in a few hours

"Hands & eyes"
24H x 365
Cloud
Secure, fast, italian and connected to the leading international providers

Virtual Data Center
- Available on 3 platforms
- Well-stocked: compute resources, licenses, backup...
- Local high reliability or "multi-data center" international distribution.

Sap Hana Cloud
- Available in Milan and Verona
- Sap certified server farm
- Great versatility in the configuration
- Redundant nodes in "HA", even on more data centers.

Virtual Servers
- 4 predefined servers
- Windows and Linux
- Backup included
- Optional management
- Local high reliability

DR as a Service
- Configurations available: from client to data center, from data center to client, from data center to data center
- Established in Rome and Milan
- Complete with software licenses and periodic test service.

Private Cloud
- Out of the box and full managed projects
- Hardware, licenses, software and management included
- VMware, Openstack and Sap Hana platforms

Global Cloud
- Direct connections to AWS, Azure, Google, IBM, Google, Salesforce, Oracle
- Possibility of interconnections even in Frankfurt, Amsterdam, Paris, Bruxelles, London.
Communication

Technologies for business communication

Voice
- **Voice interconnection** and **number hosting** for operators
- **Voice + virtual switchboard** out of the box solutions with number portability for companies
- **Specialized portal** for resellers
- **"Flat" services** for small and medium-sized companies

Messaging
- **SMS gateway**. Sending and receiving sms with users and options management portal
- **PEC**. Native supply of PEC mailbox.
- **Email**. Virtual mail server and Microsoft Exchange solutions
- **Fax Gateway**. Incoming and outcoming "legacy" faxes traffic management.

Videoconference
- Native solution based on "Metaswitch" exchange
- Specific projects for room equipment and distributed videoconference.
Management

Entrust ICT management and concentrate on your business

**Systems**

- **Operating System**
  - Windows, Suse, CentOs, Red-Hat, Ubuntu, Oracle Linux, AIX

- **Middleware**
  - Apache, Tomcat, IBM Websphere, JBOSS, Microsoft IIS, NGINX, FTP/SFTP

- **Database**
  - Oracle DB, Microsoft SQL Server, MySQL, PostgreSQL, DB2

- **Hypervisor**
  - VMware vSphere, Microsoft Hyper-V, Citrix Xenserver, Oracle VM, AIX (LPAR)

**Infrastructures**

- **Networks**
  - Lan and Wan, switch and router.

- **Backup**
  - Proprietary backup systems management.

- **Storage**
  - Storage and local switching infrastructure.

- **Firewall**
  - Fortinet, Cisco.

**Platforms**

- **AS/400**
  - Basic system activity, monitoring, migrations.

- **SAP**
  - SAP Basis. Sap/Sap Hana.

**Integrated management**

- **Systems**
- **Infrastructures**
- **Platforms**
- **Project Manager**
- **Service Manager**
Cybersecurity

Knowledge
To improve customer cybersecurity awareness

- Vulnerability Assessment
- Penetration Test
- GDPR Compliance
- Risk Assessment
- Gap Analysis
- Business Impact Analysis

Protection
To defend from cyber attacks or to mitigate their impacts.

- Anti-DDoS
- Endpoint Security
- Network protection
- Application Protection
- Data Protection
- Cloud Security
- Identity & Access Management

Detection
To analyse the events and to suggest the best defense/reaction from the bad ones.

- Threat interception
- Threat intelligence
- Vulnerability management

Reaction
To respond to an attack in progress and to restore a safe situation.

- Incident response
- Forensic analysis

Security Operation Center
Certifications and Customers
Certifications

International Standards

Technology

- SAP® Certified in SAP HANA® Operations
- SAP® Certified in Hosting Services

- Microsoft Certified: Windows Server 2012
- VMware Certified Professional
- ITIL® Foundation V3
- ITIL® Expert Level

- EMC² Certified
- CCNP Certified
- CCNA Certified
- Cisco Certified Network Associate
- Network+ Certified
- VMware Certified
- Microsoft Certified: Systems Administrator
- Microsoft Certified: MCP
- Microsoft Certified: BizTalk
- Microsoft Certified: Windows
- Microsoft Certified: SharePoint
- Microsoft Certified: .NET Framework
- Microsoft Certified: SQL Server
- Microsoft Certified: Identity
- Microsoft Certified: Application

- DNV GL
- ISO 9001
- ISO/IEC 27001
- IT Service Management System (DNV GL)
- Information Security Management System (DNV GL)
Skills and Capabilities

Networking & Security

Server & Storage

Transport, Access & Switching

Software & Solutions

Cloud

- Cisco Systems
- Juniper
- AVAYA
- FORTINET
- IBM
- Hitachi
- BROCADE
- SUN
- Tintri
- Palo Alto
- Check Point
- Radware
- Stormshield
- Allot
- Parallels
- NetApp
- Lenovo
- Lexmark
- HP
- DELL

- Metaswitch Networks
- AudioCodes
- MicroSoft
- ZHONE
- Alcatel-Lucent
- Ericsson
- Infinera
- CERAGON
- SELA
- Patton
- Ekinops

- Trend Micro
- Zimbra
- Symantec
- Microsoft Gold Certified Partner
- Citrix
- Veeam
- Akamai
- HP

- VMware
- Office 365
- OpenStack

- VMware
- OpenStack
### Our Clients

#### Industry
- ALA
- Bisazza
- Boehringer Ingelheim Italia
- Calzedonia
- Cementir Holding
- Dainese
- GlaxoSmithKline
- Golden Lady
- Golden Point
- Gruppo Italiano Vini
- IMPE Gruppo Natuzzi
- L'OREAL PARIS
- Marelli Motori
- Medacta
- MyChef
- Pixartprinting
- RED BULL
- Salmoiraghi & Viganò
- Scorpion Bay
- Tucano Urban
- Vis Industrie Alimentari

#### Automotive
- Audi
- BMW
- Renault Retail Group
- Viscofer
- Volkswagen

#### Media
- Editrice Quadratum
- Giuffrè
- Giunti Editore Mondadori
- IEN- Italian Entertainment Network
- Il fatto Quotidiano
- Rai Way
- SKY

#### GDO
- Carrefour
- SISA Distribution
- Poli Supermarket Group
- LD Market
- MD Spa

#### Services
- Accenture
- Almaviva
- AXIOMA
- Bombardier Transportation Italy
- Co.Ge.Di International
- Corvallis
- Daikin Applied Europe
- Dedagroup
- DHL International
- Facile.it
- Greenyard Fresh Italy
- I.CAR
- i-Faber
- Immobiliare.it
- Innovaway
- GI Group
- Moto.it
- OIA Services Ltd.
- Quadrigo Italia
- Reply
- Sifte Berti
- Sistemi
- Sittam
- Subito.it
- TT Tecnosistemi
- Unicef
- Valassiss

#### Finance and Insurance
- ACRI
- Alliance Healthcare Italia SpA
- Banca del territorio Lombardo
- BCC Pordenone
- Cattolica Assicurazioni
- Fineco
- Groupama AM SGR
- Nabis
- SIAED
- Toyota Financial Services
- Vittoria Assicurazioni
- UBI Banca
- ADSP (La Spezia e Marina di Carrara)
- AMA Roma
- ATC Esercizio Spa La Spezia
- Consorzio Parco dei Colli di Bergamo
- Provincia di Treviso
- Società Cooperative Culture

#### PA
- BT Italia
- Cable & Wireless
- Cogent Communications
- Colt Telecom
- Fastweb
- Globecast
- GTT

#### Infrastructure
- Aeroporto Valerio Catullo
- Autostrada BS-PD
- Autostrade Meridionali
- Cogide
- Dolomiti Energia
- Edison
- ERG
- EAUT Umbro-Toscana
- Unigas Distribuzione
- Uniacque

#### Carrier & OTT
- H3G
- KPN
- Level 3
- N.G.I. - Eolo
- NTT Communications
- Orange
- Skylogic
- Tata Communications
- Telecom Italia Sparkle
- Telespazio
- Terna
- TIM
- Verizon
- Vodasta
- Wind

#### HealthCare
- ASL TO4
- Cliniche Habilita
- Istituti Ospedalieri Bergamaschi
- Medicenter Group
- San Raffaele Roma

#### Utility
- Cogide
- Dolomiti Energia
- Edison
- ERG
- EAUT Umbro-Toscana
- Unigas Distribuzione
- Uniacque

The major Over The Tops and International Content Delivery Networks are in Avalon Campus.