

# Europass Curriculum Vitae



#### Personal information

First name(s) / Surname(s) Maurizio Forcieri

Address(es) private home and business (as free-lance engineer): piazza Antonio Gramsci 4 – 20835 Muggiò

(Monza & Brianza - Italy)

business (@ SkyTech S.r.l.): housed within CST (Centro per lo Sviluppo Tecnologico) via delle

Pianazze 74 – 19136 La Spezia (Italy)

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Nationality Italian (born in Genoa)

Date of birth September 21st, 1949

Gender Male

Desired employment / Occupational field

Businessman, Free-Lance Engineer, Advisor, Business Angel/Coach,

pational field Manager

## Work experience

Dates 2020 ongoing

Occupation or position held Member of the Charter's (1) Trasport Committee and (2) Urban Planning Committee

Main activities and responsibilities Within the membership of the respective Committees, contribute to critical review of draft plans set forth by relevant Authorities (without ruling out independent planning and

proposals) for:

 trasport infrastructure and public transport (commuters) on a local (Provincial) basis, with special attention to byking lanes that connect the estate of various Municipalities;

 zoning for settlement/building of residence, industry, commercial, logistics, Institutions, public services etc., and services, jointly with utilities (fresh water, sewers, energy, ...) as well as with trasport infrastructure in general; with special attention to re-use and re-habilitation of wasted land according to the Regional Law (latest RL n°18/2019)

representative from every Commission

Type of business or sector territorial planning, land use

Dates 2020 ongoing

Main activities and responsibilities nominated by the Civil Justice to (i) asses the accidental or wilful origin of a fire in a building;

(ii) assess in detail the damage suffered by the plaintiff, and the adequacy of the amounts offered by the insurance company to indemnify him; technical & cost report fully endorsed by

the Judge

Name and address of employer the Civil Court of Monza

Type of business or sector forensic engineering, fire investigation

Dates 2020 ongoing

Occupation or position held member of the Urban Planning, Environment, Landscape, and Public Works Committee

Main activities and responsibilities Review the *Piano di Governo del Territorio* dating back to 2012, to comply with the new Regional Laws n° 31/2014 on saving land, and n° 18/2019 on the remediation and recovery

of degraded buildings and estate, including infrastructure and green areas for leisure and

wildlife

Plan for new public buildings, mainly the new Cultural Centre and first and foremost the

Library, drawing up a "bibliotheconomic programme"

Evaluation of the "project financing" proposal submitted by an entrepeneur for the

maintenance and operations of the local cemetery

Evaluation of individual construction proposals submitted by private persons on their own

estate

Name and address of employer the Town Council and public Administration of Muggiò (MB - Italy)

Type of business or sector urban and landscape planning - a part-time, voluntary, essentially no-profit professional job

Dates 2018

Occupation or position held 
Chartered Expert following a public Call

Main activities and responsibilities [free] Specialised Assistance Services to enterprises of the territory

Name and address of employer

CCIAA MiLoMB (Camera di Commercio Industria Agricoltura e Artigianato) of the Provinces

of Milano, Lodi, Monza & Brianza

Type of business or sector

free-lance consultancy in various fields: IPRs, startup and innovative SMEs, SME networks

Dates

Fall 2013 - spring 2016 (two cases)

Occupation or position held

Technical Advisor to stand for the defendant party in two litigations about electrical systems in buildings - Consulente Tecnico di Parte (CTP) - one extrajudicial (fall 2013 - spring 2014) and one filed in front of the Justice, hence deferred and ending with ADR (spring 2016)

Main activities and responsibilities

Case #1: On-site appraisal, at the ongoing construction works, and analysis of the noncompliances alleged by the plaintiff (Customer) to legally binding codes and/or contractual requirements; assessment of alleged ecomonical damages, including direct (amendment cost for the electrical system itself) and consequential (cost of destroying & remaking the subsequently overlaid floor heating, walls mortar/lining etc.); search for judicial sentences on previous like cases in the jurisprudence database (typically about the admissibility of the indirect damage in full, and/or joint liability with the construction works director); establishment of the technical arguments in support to a claim for a judicial works stop order, to be followed by a third-party appraisal.

Case #2: On-site appraisal, jointly with the CTU (Consulente Tecnico d'Ufficio) delegated by the Justice, to see the alleged non-compliances and un-finished electrical works due under various (2+) Contracts between the same Parties. Assessment of the technical and programmatic inconsistencies in requirements and inputs to the Contractor, both among the various contracts and within each individual Contract, which amply relieve the Contractor from any such liabilities.

Name and address of employer

Free-lance

Type of business or sector

Forensic engineering

**Dates** 

Summer 2013

Occupation or position held

Project against a competitive Call for Ideas "Vivere Villa Greppi" on how to exploit an 18th century "Villa Greppi" in Brianza (north of Milano)

Main activities and responsibilities

The public body Consorzio Brianteo Villa Greppi owner of the - so far under-exploited - Villa, jointly with the local Charters of Architects and Engineers, issued a competitive Call for Ideas on how to exploit this wonderful resort along with its large garden, in compliance with the Consorzio's own not-for-profit statutory mission, under the tight constraints that apply to historical buildings, and with due regard to economic sustainability. See the resort and the Call at www.villagreppi.it.

The project proposed, titled "Centro Culturale Villa Greppi - Creativi nel Tempo", focused on the notion of "active school" for pupils of all ages, in line with the principles set forth by, among the more recent Authors, John Dewey's "Education and Democracy"; and featured a thorough assessment of engineering feasibility (including, but not limited to: hygiene, energy performance, fire safety engineering, site and assets security...) and a profit-&-loss business

The project team also involved three collaborators: two young architects and a young engineer, and earned an "Award" with a special statement of appreciation.

Name and address of employer

Free-lance.

Type of business or sector

Urban & social, educational planning. Landscape, environmental, architectural, restoration, and engineering (incl. energy efficiency, fire safety etc.) applied to historical buildings

Dates April 2012

Occupation or position held inventor - applicant

Main activities and responsibilities

see Appendix 6.5

Name and address of employer

Self

Dates October 2011 on

Occupation or position held Mediatore Civile

Main activities and responsibilities 
Alternate Dispute Resolution (ADR)

Name and address of employer TrendCom S.r.l. (by appointment with Ministero della Giustizia under Italian Dlgs. 28/2010)

Type of business or sector As above

Dates 2011 through 2016

Occupation or position held Independent expert in support of FI.L.S.E. (Finanziaria Ligure per lo Sviluppo Economico) to

audit the technical performance under industrial R&D projects ERDF-co-funded run by SMEs (either individually, or grouped under *RTIs* (*Raggruppamento Temporaneo di Imprese*) or by large companies (leading RTIs with SMEs) most often also involving Academia and research Bodies; audit according to implementation rules set forth by Regione Liguria for its own FESR (*Fondo Europeo di Sviluppo Regionale*) in compliance with Regulation (EC) N°

1828/2006 and COCOF instructions manual

≈61 projects audited so far, in the most diverse fields of hi-tech manufacturing, as well as drugs, food, logistics, services, software etc. among which ≈12 in the marine/naval field

Main activities and responsibilities see Annex 1 for a summary of all Projects audited so far

Name and address of employer Fi.L.S.E. = Finanziaria Ligure per lo Sviluppo Economico, an instrumental Body of the

Regione, administering EU funds

Type of business or sector Acting in support to the Public Administration under *ad hoc* frame contract

Dates 2010 to 2018

Occupation or position held Member of IBAN – Italian Business Angels Network

Main activities and responsibilities Informal venture capital with startup businesses ("seed money"); support in building

partnerships

Name and address of employer Self (as equity investor and/or management partner – not as an employee)

Type of business or sector 
Any (mainly manufacturing of hi-tech industrial goods)

A special co-operation took place with a company located in Naples - see Annex 7

Dates 2008 on

Occupation or position held Free-lance professional chartered engineer

Main activities and responsibilities Cadastrial surveys and registration of new/renovated buildings & estate (2 residential

projects)

Consultancy in estate affairs, incl. tax relief for existing buildings renovation & plants

revamping (4 residential projects)

Design and construction director including building and systems (3 residential projects)
Occupational Health & Safety (OHS) co-ordinator at construction works (3 residential

projects)

Certified engineer ("certifier") for Energy Performance and for Fire Prevention in buildings Consultant (jointly with a Lawyer) in extra-judicial litigation about real estate business: compliance of building with private and public codes regarding the ratio height vs. stand-off w.r.t. border of neighbour estate; extensive search in cadastrial and contractual records for ownership and physical location of dividing wall w.r.t. the exact ideal border line; assessment

of damage brought about by excavation works to existing building; ...)

Name and address of employer Self-employed

Type of business or sector (Civil) Engineering

Dates January 2<sup>nd</sup>, 2008 - ongoing

Occupation or position held Stockholder/Partner (1/3), Chairman of the Board, Legal Representative, and Security Officer

(not an employee)

Main activities and responsibilities A

As above

Name and address of employer

Skytech S.r.l. – via delle Pianazze 74 – 19136 La Spezia – Italy

Type of business or sector

Hi-Tech Electronics, Aerospace & Defense, Scientific Instrumentation

Upon joining SkyTech drafted the Statute, where in particular the strong cohesion within the Company is emphasized by: givernance rules as:

- Art. 12bis: rules the prerogatives of, and the subjects set aside for the Assembly, that cannot be delegated; as well as the qualified majority for valid deliberations (greater that 2/3 positive, with one abstention, but not with one negative);
- Art. 21: rules the prerogatives of the Board, that cannot be delegated in general, but
  only case by case, for affairs that exceeds the day-by-day business or require heavy
  investments or risks or costs or long-term commitments; legal actions, etc.:

Security Officer for classified projects

Promoted and managed various projects including capital investments and R&D, with business planning and partnership setup (in general, with both industries and research institutions).

Summer 2012: inventor and proposal manager for the SCALA project "Sicurezza nei Cantieri per gli Addetti ai Lavori", submitted at the Italian Space Agency's Call reserved to SMEs. See Annex 2 for details.

Spring 2016: proposal manager for the "SI-Dual-Sy" project to be submitted under the Horizon 2020 Work Programme 2016-2017 - chapter 14. Secure societies, Protecting freedom and security of Europe and its citizens - Critical Infrastructure Protection - CIP-01-2016-2017: Prevention, detection, response and mitigation of the combination of physical and cyber threats to the critical infrastructure of Europe: a multi-million "Innovative Action" project that, at time of writing, involves partners in at least 6 EU Countries (to be confirmed); co-ordinated by SkyTech. Project withheld until forthcoming Call. See in Annex 3 more about this Project.

SkyTech is specifically active, among others, in the naval/marine field with various projects:

- SkyTech, jointly with other SMEs, has joined the *Distretto Ligure delle Tecnologie Marine* (DLTM) through the *Consorzio* Tecnomar since its establishment;
- as partner with the leading company Ingegneria dei Sistemi (IDS) SkyTech cooperated in the PLASTIC project (PLatform Agnostic Sensors for opTlmised design
  of midlife ship refitting) that is a UAV-based system, with ground processing
  software, for the near-field survey of the ship EM-signature: in particular, SkyTech's
  role was to develop the UAV-borne equipment including RF sensor, video camera,
  and data acquisition [PLASTIC is a DLTM project, co-funded under ERDF];
- in the DeepEye project, SkyTech is the leading partner with other SMEs and research bodies: the purpose is to develop an autonomous underwater vehicle equipped with a special camera (and light) to monitor the UW bio-environment, and a special image onboard processing, classification and storage software, required because there is no telemetry link [DeepEye is co-funded by ERDF];
- in the La.Ma. project (LAnd/MArine Magnetometric Detector for Selfinformed Systems) funded by the Italian MoD's PNRM (*Piano Nazionale di Ricerche Militari*) SkyTech is the leading partner, jointly with research and University Bodies: a breadboard has been developed, while the underwater version (TRL≈8) is the subject of a new contract just signed with NAVARM (*Direzione Generale* dell'Armamento Navale); same for MagDeFence project just submitted to START4.0.

Dates January 2<sup>nd</sup>, 2008 through October 31<sup>st</sup>, 2008

Occupation or position held Consultant (resident on-site, full-time at Laben) on a free-lance contractual basis, to phase-out the previous job and hand it over to younger colleagues

Main activities and responsibilities (1) Export Control (2) Product Policy and Applications Development (3) ITER (nuclear fusion)

Name and address of employer Thales Alenia Space Italia S.p.A. (former name: Laben – Laboratori Elettronici e Nucleari

S.p.A) – via Enrico Mattei 1 - 20064 Gorgonzola (Milano – Italy)

Type of business or sector Space, Nuclear and Defense Instrumentation & Systems

Dates 2007÷2008

Occupation or position held Business Coach

Main activities and responsibilities unsolicited proposal to the Italian MoD's PNRM (Piano Nazionale di Ricerca Militare)

Name and address of employer Magnetek S.p.A. (now Power One) - see Annex 7

Type of business or sector power generation and conditioning (man-pack fuel cells)

Dates 2008

Occupation or position held Individual Tutor

Main activities and responsibilities 
Tutorship for young graduate researchers under the INGENIO programme

Name and address of employer Regione Lombardia administering EU/ESF supplemented by own national/regional funds

Type of business or sector Acting in support to Regione Lombardia's administration under *ad hoc* consultancy contract

(target projects: Life Sciences, Bio-Chemistry, research on new drugs, bone implants,...)
[NB: Regione Lombardia as a P.A. took over directly the tasks of managing funds, instead of the former assignee FinLombarda S.p.A., because assignment of such tasks in direct negotiation with the latter, without competition, was deemed prohibited under the EU market

rules].

All of the consultancies (identified by Beneficiary's short-hand jointly with host Institution's name) address research projects on health issues:

Mrs. Caterina L. - Università degli Studi Milano-Bicocca (Monza): research on the role of MAPK (Mitogen Activated Protein Kinases) in the competition between adipo- and osteogenesis; connection with bone depletion; trials on human MSC (Mesenchimal Stem Cells); analysis using confocal microscopy, cito-fluorimetry, PCR (Polymerase Chain Reaction), immuno-blotting,...

Mrs. Ezia B. - Istituto Mario Negri - Milano: research on anti-tumour activity of Aloe Emodin (AE); research on AE esters (among those obtained with a broad range of organic acids) that are most readily soluble/hydrolised hence available to deploy their action; production and refinement of AE esters using crystallisation and chromatography techniques; characterization of AE esters with mass, NMR,and IR/UV spectroscopy, GC/HPLC,...; pharmaco-kinetics and -dynamics tests, *in-vitro* (on mouse cells) and *in-vivo* (on mice with an implant human of neuroblastoma cells)

Mr. Edoardo D. - Istituto Ortopedico Galeazzi - Milano: knowledge management and information retrieval techniques ("thesaurus" based on semantic analysis of un-structured clinical records); pilot application e.g. for long-term monitoring and preventive maintenance of bone implants in elderly people

Dates 1996 to 1999

Occupation or position held Head of Marketing & Sales (position held in parallel with that of Security Officer)

Main activities and responsibilities

Set up and manage a team of 7 senior Marketing & Sales Managers, each specialising in one among the main Space business sectors (Science, Earth Observation, Telecom, Infrastructure, Microgravity, Launchers) and Nuclear; as well as 3 Contract Officers, plus a pool of secretaries. Main tasks:

- co-operate with CEO/DG to identify the relevant yearly budget (approx. 50M€/year) and commit to it;
- monitor the market trends and the main institutional Customer's (Agencies)
  acquisition plans, both directly and through active attendance at "Future Outlook"
  meetings at Eurospace (Association of European Space industries, based on Paris)
  as far as Space is concerned;
- same for non-space business including contact and lobbying at various Administrations such as Defence, Health, Environment, Foreign Affairs, Home Office, Industry, Research, etc.;
- same with nuclear research Bodies such as INFN and CERN, and nuclear nonresearch Bodies such as CTBTO (the U.N. Committee monitoring the nuclear test ban worldwide) IAEA, CEG (Contact Expert Group for joint effort by Western Countries in support to nuclear decommissioning and waste disposal in former USSR)
- monitor the technology trend, both directly and through active attendance at "Technology Harmonisation" meetings at Eurospace and with European and Member States' Agencies;
- plan for early R&D effort ahead of the ITTs being issued, committing to its success through business planning;
- first-instance screening of ITTs (both "acquisitions" and "R&D") whether to bid or not; if so, allocate ad-hoc budget for tender preparation from the Marketing&Sales' Dept.'s own overall available budget;
- identify and manage the most appropriate sub-contractors as required for the scope of work; issue RfQs tailored to them; negotiate their share of work, deliveries, and budget;
- proposal management, including all aspects: engineering, product assurance, Hi-Rel
  parts acquisition including export licences (see above), legal, logistics, WBS/WPDs,
  price, price breakdown by WP, payment plan, background and foreground IPRs,
  etc.;
- proposal delivery;
- tender negotiation with Customer and, if successful, project kick-off;
- after contract signature: monitor the accomplishment by own workforce and by subcontractors; issue invoices; manage inventories; manage foreground IPR including software licenses; manage formal contractual changes as "new procurement";
- apply for any Agency's authorisations as may be required prior to selling on the open market, or abroad, any products or technologies developed under Agency's programs;
- where deemed appropriate, submit unsolicited proposals at system or equipment level.

Unique LABEN contact appointed by the Italian Space Agency ASI, for direct access to DODIS (the ESA Document Distribution System for sensitive strategy and industrial policy matters, on a "only for your eyes" basis).

Liable for a yearly budget of new contract acquisitions in the order of 40 to 50M€.

Name and address of employer

Thales Alenia Space Italia S.p.A. (former name: Laben – *Laboratori Elettronici e Nucleari* S.p.A) – via Enrico Mattei 1 - 20064 Gorgonzola (Milano – Italy)

Type of business or sector

Space, Nuclear and Defense Instrumentation & Systems

Dates January 1985 - May 1996

Occupation or position held

Marketing & Sales Manager (position held in parallel with that of Security Officer)

Main activities and responsibilities

As above

Name and address of employer Thales Alenia Space Italia S.p.A. (former name: Laben – Laboratori Elettronici e Nucleari S.p.A) – via Enrico Mattei 1 - 20064 Gorgonzola (Milano – Italy) Type of business or sector Space, Nuclear and Defense Instrumentation & Systems **Dates** 1990-2007 Occupation or position held Security Officer (position held in parallel with that of Marketing & Sales) Main activities and responsibilities As above, for classified Defense projects (e.g. Helios, Sicral, Cosmo, Galileo,...) managed and maintained the ongoing clearance of facility and of individual employees (including sensitive personal data) managed the application of project-specific Security Agreements between member States (e.g. France Italy & Spain) and at EU level managed a major facility upgrade project to new EDP and Crypto security (COMSEC/INFOSEC) requirements, with separate labs and meeting rooms for 3 independent projects (e.g. Galileo, Helios, Sicral) for over 300k€ capital expenditure all the above under a personal liability in case of wilful or accidental information leakage

Name and address of employer

Thales Alenia Space Italia S.p.A. (former name: Laben – *Laboratori Elettronici e Nucleari* 

S.p.A) – via Enrico Mattei 1 - 20064 Gorgonzola (Milano – Italy)

Type of business or sector

Space, Nuclear and Defense Instrumentation & Systems

Dates 1999-2008

Occupation or position held 

Export Control correspondent

Main activities and responsibilities

The (local) export control correspondent, belonging to a trans-national organization at Group level, shall ensure that all goods and technologies used and manufactured at the facility are either free of any license, or are granted a license by the Government of the respective Country of origin. This requires to:

- monitor the technological contents (including performance) of equipment at all levels, whether it falls under any of the the concerned categories;
- make sure any risks delays and costs are duly accounted for since the bid time, and warn the Customer thereabout;
- obtain from Customers and forwarding to any foreign suppliers or subcontractors the relevant statement of End-User / Final Destination;
- make sure the foreign supplier applies as the case may be (Dept. of State for ITAR, dept. of Commerce for EAR etc.) for components, assemblies and technologies (including software) made-in-USA, regarding their import to Italy, as well as re-export elsewhere (for further system integration and test, launch operations etc.);
- as an option for export-sensitive devices, see that they may be duly encapsulated so that they cannot be disassembled and reused elsewhere;
- monitor that notwithstanding any evolutions in the programme (e.g. final choice of one launcher instead fo another: this occurred with AGILE!) the terms and "provisos" of the License including its Technical Assistance Agreement (TAA) are complied with at all times;
- apply for equipment-level export license from National and EU Authorities, under Italian Law n°185/1990 and EU Regulation n°1334/2000 (now n°428/2009) regarding the export of manufactured goods. whether falling under the *de minimis* amount (for dual-use devices) or not.

Because a non-USA entity is normally not allowed (i.e. simply useless) to apply directly to the USA Administration (DoS/DoC) the Thales Alenia Space group set up a local office of its own, registered as a USA entity, in charge of that.

Breach of the a.m. regulations would lead to heavy sanctions:

- for National and EU regulations, criminal as well as fine and administrative sanctions to the Company, according the Dlgs. 231/2001, that may include withholding industrial operations;
- for EAR/ITAR, although a non-USA entity cannot be directly prosecuted, the
  sanction is indirect, but nevertheless heavy: (1) the natural person (CEO, but also
  export control correspondent) is declared persona non grata in the USA and in case
  of immigration may be at least immediately rejected, if not arrested, (2) the company
  is written into the "black list" of those, with which no USA subjects are formally
  allowed to trade.

Name and address of employer

Thales Alenia Space Italia S.p.A. (former name: Laben – *Laboratori Elettronici e Nucleari* S.p.A) – via Enrico Mattei 1 - 20064 Gorgonzola (Milano – Italy)

Type of business or sector

Space, Nuclear and Defense Instrumentation & Systems

Dates Late 1980s, for about one year

Occupation or position held Project Manager resident at ESA/ESTEC Noordwijk. Holds a lifelong, permanent entry permit

to all ESA facilities.

Main activities and responsibilities Service Contract for Satellite Check-Out Software (first applied to EuReCa - the European

Retrievable Carrier platform)

Name and address of employer Thales Alenia Space Italia S.p.A. (former name: Laben – Laboratori Elettronici e Nucleari

S.p.A) – via Enrico Mattei 1 - 20064 Gorgonzola (Milano – Italy)

Type of business or sector Space, Nuclear and Defense Instrumentation & Systems

Dates September 1977 – December 1984

Occupation or position held Project Manager

Main activities and responsibilities Programmatic / technical management of several projects, mainly in the space ground

segment

Name and address of employer Thales Alenia Space Italia S.p.A. (former name: Laben – Laboratori Elettronici e Nucleari

S.p.A) – via Enrico Mattei 1 - 20064 Gorgonzola (Milano – Italy)

Type of business or sector Space, Nuclear and Defense Instrumentation & Systems

Dates September 1975 – September 1977

Occupation or position held Project Engineer

Main activities and responsibilities 9 months co-location at the then C.I.A. (Compagnia Industriale Aerospaziale) prime

contractor, Rome, for development of satellite test software for SIRIO (first Italian GEO telecom satellite) and support to satellite integration & test including environmental tests at ESA/ESTEC and ground segment compatibility tests at NASA's Goddard Space Flight

Centre

Further Product Assurance tasks on flight hardware:

tests of high reliability (spaceflight-rated) electronic components

• overall reliability analyses of satellite avionics

Name and address of employer Thales Alenia Space Italia S.p.A. (former name: Laben – Laboratori Elettronici e Nucleari

S.p.A) – via Enrico Mattei 1 - 20064 Gorgonzola (Milano – Italy)

Type of business or sector Space, Nuclear and Defense Instrumentation & Systems

Dates March 1974 – September 1975

Occupation or position held Navy Officer (draftee) Technical Corps "Armi Navali", sous-lieutenant

Main activities and responsibilities 
Advisor to the Head of Computing Centre

Name and address of employer Italian Navy's Istituto Idrografico della Marina, Genova, including inspections and short

voyages onboard hydro- and oceanographic ships (existing and under construction); evaluation of industrial tenders for upgrading a pilot vessel with automated hydrographic survey systems; implementation of automated ground processing programmes for maps,

portolans editing, etc.

Type of business or sector Defense Administration – specifications, development/procurement & test of real-time

computer systems (shipborne & ashore) for automated hydrographic survey & processing of official maps, also using then state-of-the-art navigation systems (LORAN, TORAN, OMEGA, MiniRanger,...) and emerging EDP facilities, with an aim to replace manual typesetting and

map drawing work

Dates 1974

Occupation or position held Free-lance post-doctoral research

Main activities and responsibilities Theoretical (algorithmic) research on ROI-image processing for pattern recognition (2D

filtering)

It is worth noting that this research (a follow-up of the doctoral thesis) aimed at modelling, as a computer algorithm, the actual ROI (Region-of-Interest) image pre-processing assumed to take place in the mammals' (cat) retina, i.e. well ahead of any conscious or un-conscious processing by the brain; and was connected on the one side with ongoing physiological research, on the other with ELSAG's industrial R&D project on automated "reading" of

handwritten text

Name and address of employer University of Genoa by appointment with ELSAG

Type of business or sector Research in support to mail automation project at ELSAG, carrying on the doctoral thesis

work

## **Education and training**

note: schools organised by the *Ordine degli Ingegneri* are legally recognised as credits by CNI (*Consiglio Nazionale degli Ingegneri*) for the purpose of continuing education

**Dates** Summer 2013 Title of qualification awarded Statement of attendance – Special info-days in preparation for the competitive Call for Ideas "Vivere Ville Greppi" Principal subjects/occupational skills covered Info-days organised by the Consorzio Brianteo Villa Greppi jointly with the local Charters of Architects and Engineers, for the benefit of all architects and engineers who applied for the competitive Call for Ideas: involved site visits (building and garden), statutory and regulatory issues, historic and artistic background, cadastrial records, constraints that apply to buildings registered as high historic worth, etc. Name and type of organisation providing Consorzio Brianteo Villa Greppi education and training Level in national or international classification Dates Spring 2013 Title of qualification awarded Statement of attendance and proficiency – School for Test & Validation of Buildings Statics Principal subjects/occupational skills covered Collaudo Statico according to the Italian legislation for civil works Name and type of organisation providing Ordine degli Ingegneri di Monza & Brianza education and training Level in national or international classification October 2012 **Dates** Title of qualification awarded Statement of attendance and proficiency - School for Construction Works Directors Principal subjects/occupational skills covered Direzione Lavori according to the Italian legislation for public civil works Name and type of organisation providing Ordine degli Ingegneri di Monza & Brianza education and training Level in national or international classification **Dates** Spring 2012 Statement of Attendance – School on EM-fields (update for OHS chartered engineers) Title of qualification awarded Principal subjects/occupational skills covered Impact of electromagnetic fields on health and safety of workers (and on the environment) Name and type of organisation providing Ordine degli Ingegneri di Monza & Brianza education and training Level in national or international classification **Dates** March 2012 Statement of Attendance - School on Foundation works Title of qualification awarded Principal subjects/occupational skills covered As above, according to Norme Tecniche per le Costruzioni 2008 Name and type of organisation providing Ordine degli Ingegneri di Monza & Brianza education and training Level in national or international classification

Dates March 2012

Title of qualification awarded Statement of Attendance – School on acoustic impact of machinery

Principal subjects/occupational skills covered Impact of noise from machinery on health and safety of workers (and on the environment)

Name and type of organisation providing Ordine degli Ingegneri di Monza & Brianza education and training Level in national or international classification November 2011 Dates Title of qualification awarded Chartered as "Consulente Tecnico di Ufficio" as per the Italian Code of Civil Procedure Article 61 Chartered as "Perito" as per Italian Code of Penal Procedure Implementation Articles 67 to 73 Principal subjects/occupational skills covered Forensic Engineering Name and type of organisation providing Ordine degli Ingegneri di Monza & Brianza education and training Level in national or international classification **Dates** September 2011 + subsequent updates Title of qualification awarded Chartered as "Mediatore Civile" i.e. ADR - Altervative Dispute Resolution according to the Italian Dlgs. 28/2010 Principal subjects/occupational skills covered Legal Framework; Negotiation Techniques; ADR Terms of Reference and Mandate Trendcom S.r.I. (educational and ADR organisation) by appointment with Ministry of Justice Name and type of organisation providing (Currently on hold due to lack of continuing education) education and training Level in national or international classification Legal charter as above Dates February-July 2011 Title of qualification awarded Chartered in Energetic Certification of Buildings - Certificazione Energetica degli Edifici according to Regione Lombardia's "CENED" Principal subjects/occupational skills covered As above - Legal Framework; Physics and Engineering of Building and Heating Systems; Regional, National, European, and Intenational Standards Name and type of organisation providing AFOR S.a.s. by appointment with Regione Lombardia education and training Level in national or international classification Legal charter as above Dates January 2011 Title of qualification awarded Statement of Attendance Principal subjects/occupational skills covered workshop on early failure analysis by advanced NDT (Non-Destructive Test) techniques, mainly by passive acoustic monitoring on pipes under variable pressure in plants during operation ETS Sistemi Industriali srl Via S. Francesco 323 20047 Brugherio (MI) Name and type of organisation providing education and training Level in national or international classification none Dates February-June 2011 + subsequent updates Chartered in Fire Prevention/Protection Engineering & Certification Title of qualification awarded according to former Italian Law 818/1985, now Dlgs. 151/2011 Legal Framework; Chemistry and Physics of Fire; Engineering of Buildings, Plants & Operations Principal subjects/occupational skills covered

(course contents as per Law)

for Fire Prevention & Protection (passive & active fire-fighting); National, European, and Intenational Standards for Materials, Components and Systems; Fire Safety Engineering codes

Name and type of organisation providing education and training	Italian Ministry of Interior Affairs (Home Office) National Fire Corps.  (course organised care of the Ordine degli Architetti della Provincia di Monza & Brianza)
Level in national or international classification	Legal charter as above. (Currently on hold due to lack of continuing education)
Dates	May 2010 + subsequent yearly updates as required by Law
Title of qualification awarded	Chartered Safety Coordinator in Construction Work according to the Italian Dlgs. 81/2008 (former Dlgs. 494/1996)
Principal subjects/occupational skills covered	(I) safety in the design phase, (ii) safety in the construction phase
Name and type of organisation providing education and training	MicroDesign / AssoConsulting (by accreditation with Regione Basilicata)
Level in national or international classification	Legal charter as above
Dates	February-April 2010 + subsequent yearly updates as required by Law
Title of qualification awarded	Chartered Occupational Health & Safety Manager
·	(=RSPP – Responsabile dei Servizi di Prevenzione e Protezione) according to the Italian Dlgs. 81/08 (former Dlgs. 626/1994)
Principal subjects/occupational skills covered	Occupational Health & Safety – all risks at work excluding construction
Name and type of organisation providing education and training	Faculty of Engineering of the University of Perugia
Level in national or international classification	Legal charter as above
Dates	April 2010
Title of qualification awarded	Statement of Attendance & Proficiency
Principal subjects/occupational skills covered	Allocation of SIL (Safety Integrity Level) by LOPA (Layer of Protection Analysis) according to IEC61508 & IEC61511 (functional safety in industrial process plants)
Name and type of organisation providing education and training	Safety Users Group – teachers: dr. ing. Pasquale Fanelli & Mr. Didier Turcinovic
Level in national or international classification	
Dates	March 2011
Title of qualification awarded	Statement of attendance
Principal subjects/occupational skills covered	Non-Destructive Tests on Pressure Pipes and Vessels, and on Composite Materials Structures
Name and type of organisation providing education and training	ETS Sistemi Industriali S.r.l.
Level in national or international classification	_
Dates	End 2009
Title of qualification awarded	Statement of attendance and proficiency
Principal subjects/occupational skills covered	School on the New Building Code ("Norme Tecniche per le Costruzioni – NTC08" as per Italian Ministry of Infrastructures' Decree dated 14 <sup>th</sup> January 2008) compliant with the EuroCodes
Name and type of organisation providing education and training	Faculty of Engineering of the University of Bergamo by appointment with the Ordine degli Ingegneri della Provincia di Monza & Brianza
Level in national or international classification	——
Datas	End 2000

Dates End 2009

Title of qualification awarded	Statement of attendance and proficiency
Principal subjects/occupational skills covered	Seminar on the Administrative Liability of Legal Bodies, Code of Ethics, Organisational Model as per Italian Dlgs. 231/2001
Name and type of organisation providing education and training	GESTA S.a.s.
Level in national or international classification	
Dates	Fall 2009 & fall 2010
Title of qualification awarded	ESA Investment Readiness Programme (4 days) / ESA Investment Forum (2 days) full-immersion seminars
Principal subjects/occupational skills covered	Technology Transfer from Space to Ground Business – business and financing models presentation of business cases and plans by attendees
Name and type of organisation providing education and training	CSS & E-Synergy, respectively Europe Unlimited, by appointment with ESA seminars hosted by CCIAA Milano ( <i>Camera di Commercio, Industria, Artigianato e Agricoltura</i> )
Level in national or international classification	<del></del>
Dates	An overall plan of 7 residential sessions of 2 days full-immersion each, all the way through 2009, including visits at research centres and hi-tech SME incubators
Title of qualification awarded	Attendance and Proficiency in High School on "Technology Transfer from Research to Industry"
Principal subjects/occupational skills covered	"Public-Private Partnership Models for Innovation"
	2. "New Funding Approaches for Technology Transfer"
	<ol> <li>"Tools &amp; Methods for the Setup &amp; Maintenance of a Technology Portfolio"</li> <li>"Technology Intelligence Tools for the Identification of Innovation Opportunities"</li> </ol>
	5. "Business Planning for a hi-tech Startup"
	6. "Identification and Set-up of Innovation Projects for Clusters of SMEs"
	7. "Effective Management of Industrial Property and Industrial Pre-Diagnosis"
Name and type of organisation providing education and training	RIDITT = Rete Italiana per la Diffusione dell'Innovazione e il Trasferimento Tecnologico alle Imprese, a project of the former IPI = Istituto per l'Innovazione Industriale of the Italian MSE = Ministero dello Sviluppo Economico = Ministry of Economic Development
Level in national or international classification	<del></del>
Dates	April 2000 – April 2003 – April 2004 – April 2006
Title of qualification awarded	Four International Schools at the "Ettore Majorana Foundation and Centre for Scientific Culture", EMFCSC, Erice (Trapani – Italy) each 4 days full-immersion – statement of attendance
Principal subjects/occupational skills covered	"Physics and Industry" (2000 and 2002)
	"Particle Accelerators and Detectors" (2004)
	"Electron Accelerators and Free Electron Lasers" (2006)  It is worth noting that the School held in 2004 was wholly dedicated to medical applications, i.e.
	use of particle accelerators (as opposite to conventional X-ray or <sup>60</sup> Co radioactive γ-sources) both as probes for diagnosis, and for radio-therapy (typically cancer, but also brain aneurisms): charged particles, unlike photons, are very accurate and hence less harmful to healthy tissues
Name and type of organisation providing education and training	EMFCSC supported by INFN = <i>Istituto Nazionale di Fisica Nucleare,</i> INFM = <i>Istituto Nazionale di Fisica della Materia</i> , ENEA = former Atomic Energy Body, CNR = National Research Council, Universities etc.
Level in national or international classification	
Dates	Fall 1998
Title of qualification awarded	Higher School in Marketing Management of Instrumental Goods (one week full-immersion)

Principal subjects/occupational skills covered **Business Management & Administration** Name and type of organisation providing ISTUD, Belgirate (Verbania - Italy) education and training Level in national or international classification Post-Graduate School in Real-Time Operating Systems **Dates** Title of qualification awarded Statement of attendance and proficiency Principal subjects/occupational skills covered As above Name and type of organisation providing Hewlett-Packard Italia (Milano) care of the Italian Navy - stage required in the frame of the job at education and training the Italian Navy's Hydrographic Institute Level in national or international classification **Dates** November 1968 – February 1974 Title of qualification awarded University Degree in Engineering, specialising in Electronics Principal subjects/occupational skills covered Computer Science, Telecommunications, Solid State Physics Doctoral Thesis on a Pattern Recognition Algorithm for Machine Reading of Handwritten Addresses for Automated Routing of Paper Mail at ELSAG (tutor: dr. Luigi Stringa) implemented as a microprogramme on an HP2100 CPU with WCS (Writeable Control Store) Name and type of organisation providing University of Genoa education and training Level in national or international classification Laurea "Vecchio Ordinamento" (full 5-years degree with mandatory doctoral thesis) with honours (110/110 cum laude) Summer 1972 Dates Title of qualification awarded 1-month Stage on Telephone Switching & Transmission Systems Principal subjects/occupational skills covered As above Name and type of organisation providing Stage by IAESTE (International Association for Exchange of Students for Technical Experience) education and training at the then SIP (today Telecom Italia, main telephone operator, then still monopolist) visiting several "hub" exchanges and RF transmission facilities in Milano, Monza and Bergamo Level in national or international classification October 1963 – July 1968 Dates Title of qualification awarded Diploma "Maturità Classica" Principal subjects/occupational skills covered As above Liceo Classico "Andrea D'Oria" Genova Name and type of organisation providing education and training Level in national or international classification Legal diplome as above

## Personal skills and competences

Mother tongue(s)

#### Italian

Other language(s)

(further to classical Latin and Greek)

			Sel	f-as	sessme	ent

European level (Common European Framework of Reference for Languages)

#### **English**

French ("second mother language")

German Russian

Spanish - Portuguese

Understanding		Spea	Writing		
Listening	Reading	Spoken interaction	Spoken production		
fluent	fluent	fluent	fluent	fluent	
fluent	fluent	fluent	fluent	fluent	
basic	basic	basic	basic	basic	
learning	learning	learning	learning	learning	
learning	learning	learning	learning	learning	

Social skills and competences

## Political activities:

- former secretary of the Unità di Base "Luciano Donghi" dei Democratici di Sinistra in Lissone:
- former secretary of the *Autonomia Tematica "Aerospazio" dei Democratici di Sinistra* at national level (Aerospace Panel)
- founder of a Unità di Base dei Democratici di Sinistra among LABEN employees;
- today: member of Articolo Uno; member of the municipal list Muggiò Partecipata; member of the City Council's iban
- member of the Muggiò City Council's Planning Committee

#### Social activities:

- former president of the Association of Seniores d'Azienda at LABEN;
- Past Member of the Associazione Amici della Scuola di Ingegneria di Genova (="alumni")
- member of the local board of ANMI (Associazione Nazionale Marinai d'Italia); member of ANCR (Associazione Nazionale Combattenti e Reduci) and ANPI (Associazione Nazionale Partigiani d'Italia); member of the Union SPI/CGIL.

Organisational skills and competences

Industrial manager with Laben (now Thales Alenia Space) and with SkyTech

Organisation and management of Marketing&Sales + Contracts Officers staff (10+ people) tasked with search for co-funding opportunities for R&D projects, industrial/scientific team setup, proposal management, delivery and negotiation; including negotiation of contract changes and additional procurement

Organisation and management of the site security system (for Defense classified programmes)

Organisation and management of the Export Control system

Chairmanship of the Board (and legal representative) at SkyTech S.r.l.

Monitoring and independent evaluation of individual and industrial research projects

Technical skills and competences

As above, plus: Member of the Italian Society of Physics (SIF)

Computer skills and competences

General Purpose utilities (both PC-Windows & Mac-OS)

Geodetic software tools for cadastrial survey work (PREGEO for land & DOCFA for buildings)

Engineering software tools (e.g. AutoCAD)

Energy Performance of Buildings software tools e.g. CENED

Fire Safety Engineering software tools

Artistic skills and competences

Other skills and competences

Fully Chartered Engineer with *Ordine degli Ingegneri di Monza e Brianza*, registration n° A1913, in all three engineering fields: (A) civil & environment, (B) industrial, and (C) ICT

Full Member of the Collegio degli Architetti e degli Ingegneri di Monza (cultural Association)

Full member of Istituto Nazionale di Urbanistica (INU)

Driving licence

Italian "Patente B" (driving up to 3500 kg vehicles & motorcycles)

#### Additional information

Married with a chemist; two sons, also chemists

Blood Donour, ≈160 donations (full blood), Gold Medal & special awards

References can be provided if required, e.g. within the Finmeccanica Group

#### **Annexes**

- 1. list of ERDF industrial R&D projects audited on behalf of FiLSE
- 2. abstract of the SCALA project (omitted but available on request)
- 3. abstract of the Si-Dual-Sy project (omitted but available on request)
- 4. abstract of the Chernobyl IAMS project (omitted but available on request)
- 5. abstract of the DIAMINE project (omitted but available on request)
- 6. experience in IPR matters
- 7. three letters of reference issued by Customers of previous Business Coach services

By submitting this CV, I expressly authorise the addressee to publish it, including online, as required by Law and by the Call; and more specifically for data processing according to Directive (EU) 2016/680 of the European Parliament and of the Council of 27 April 2016, on the protection of natural persons with regard to the processing of personal data by competent authorities for the purposes of the prevention, investigation, detection or prosecution of criminal offences or the execution of criminal penalties, and on the free movement of such data.

Very truly – Muggiò, March 2<sup>nd</sup>, 2021 (digitally signed)



### Annex 1: projects co-funded by ERDF, audited on behalf of FiLSE, sorted in alphabetic order by [leading] Beneficiary:

- A&A: environment-friendly, non-toxic transformer isolation oil from renewable sources (vegetable oil);
- 2. AITEK: cloud-based video surveillance for critical infrastructures security;
- 3. Alcatel-Lucent+InformatSystem+TeleRobot: ASIC for very high speed communications;
- 4. AMA Group: improvements in the smart card production process;
- 5. AOC+ISMAR+MES: study and pilot project on innovative methods for bilge water processing and total oil recovery;
- 6. ASG Superconductors: compact system for full-body Nuclear Magnetic Resonance featuring an "open sky" avoiding claustrophoby and hence the need for sedative prior to the exam;
- 7. ATOMOS: ERP (Enterprise Resource Planning) software environment application;
- Bieffe: product and process improvement for TV coaxial cables;
- Boero+Omega+Tixe: innovative IR-reflective paints for energy-efficient buildings;
- 10. CLAS: food processing, includes food safety, thorough cleaning of plants after every batch, allergenes avoidance, real-time reporting to EU Authorities in case of any accident, and trials with voluntary testers following an approach similar to that used for drugs ("double blind")
- 11. CleisTech+AboData: cloud-based CAD for SMEs involved in naval engineering & appliances;
- 12. CSA: services to SMEs based on ICT tools and de-materialisation of paper records;
- 13. DataGest: machine vision for in-line mass production monitoring of piece parts (nuts & bolts);
- 14. DemoAT: R&D on an ICT environment for sharing of public administration territorial policies with the citizens, and consensus building ("e-participation");
- 15. DotVocal: computer natural-speech-based MMI for people with an impaired sight, using speech sinthesis and speech recognition as well as an *ad hoc* semantics approach
- 16. EsaOte+ELCO+NeoLogica+SyO: design and development of a web-based platform for remote access to and retrieval of clinical and instrumental diagnostic data and for [near-real-time] remote consultation / second opinion;
- 17. ETT: "Parkinson-home": intrumented gloves to follow-up the Parkinson disease and care at home by performing established manual exercise, includes dexterity and force monitoring;
- 18. FOS+EsaControl: monitoring system to improve solar arrays performance & maintenance;
- 19. Gadomed: software-supported methods for bio-hazard evaluation in hospitals
- 20. Gennaro: onboard, realtime monitoring system to improve performance and preventive maintenance of vessel engine and propulsion chain, and compliance with MARPOL rules;
- 21. GMG: "Robo-Paint" development of a hull painting robot;
- 22. GreenProject: devices (and consumables) for in-line marking of red-hot cast iron and steel;
- 23. GruppoSigla+HydroData: SEAGOSS processing of remote sensing data (including from satellites) for early warning and near-term nowcasting of oil slicks and sediment plume at sea;
- 24. HylaSoft: ERP (Enterprise Resource Planning) software environment;
- 25. HylaSoft+AboData: safety & security network with application to fire detection onboard ships;
- 26. IBR Sistemi: study and experiments on the corrosion of metal in solid-oxide electrodes for fuel cells by means of integrated test bed;
- 27. InfoCom: home gateway and proxy for energy management of household appliances;
- 28. IREN Acqua&Gas+CapTel+MedService: new (nano)sensors, automated sampler device, and software environment, to monitor the water quality (e.g. against heavy metals pollution);
- 29. IIS (Istituto Italiano della Saldatura): robotised machine including laser+arc welding for Aluminum structures
- 30. Laboratorio Farmaceutico CT: new drug against the alcoholics' "craving" (GABA-based)
- 31. Linear: hearing aids with microphone phased arrays (built into spectacle frame) for improved directional selectivity, for people with an impaired ear;
- 32. M3S: ICT devices for monitoring the traffic on communications networks;
- 33. Mastelli: clinical "Phase IV" test (double blind against *placebo*) about the effectiveness of Placentex (and more specifically PDRN polydesoxyribonucleotide originally extracted from human placenta; today extracted from trout sperm) to heal diabetic foot ulcers
- 34. MCS: study and development of a 4-D simulator for laparoscopy surgery;
- 35. Mectron: innovative formulas for chemical resins & new UV-light devices, for dental (more generally, bone) surgery and implants;
- 36. Microdata2: study on wireless sensor networks and implementation of a test bed for fire detection and people evacuation monitoring, including outdoor and indoor (at one's own home);
- 37. Mikai: non-invasive external fixator kit for healing fractures with injuries to inner body organs;
- 38. Moog+Master+Newtech: direct-drive generators for wind turbines, & power conditioning;
- NACON+NIS: ERP with cloud-based knowledge management for ubiquitous access;
- 40. NICIM: ERP (Enterprise Resource Planning) software environment development;
- 41. Officine Meccaniche Garrone: innovative trailer-mounted saw for rock cutting;
- 42. Officine Meccaniche Sanfilippo: one-way valves for pressurised steam turbines;

- 43. OnAir+SVM: "GUARD-1" high-resolution image acquisition and recognition for new generation underwater vehicles;
- 44. Optics International: R&D and field trial of innovative spectacles with colour filters for elderly and more generally for people with an impaired sight;
- 45. Optisoft: CAD for stowage of goods onboard ships, for optimised lading/unlading;
- 46. Optisoft: computer-assisted logistics for large truck fleets;
- 47. Paramed: innovation in Magnetic Resonance Imaging;
- 48. Qui!Services: dematerialisation of meal tickets;
- 49. RGM: solid-state digitaly controlled power conditioning (& inverters) for propulsion of trains;
- 50. SCALAB: intelligent front-end with pre-processing, for video surveillance;
- 51. Sciroidea: innovation in train cockpit simulator technology, with eye and face mimics tracking, to detect loss of awareness, fatigue etc., and improve training and, in the long term, MMI;
- 52. SD Diamant: Cobalt-free ceramics for abrasive bits (inserts) e.g. for rock cutting;
- 53. Sistemi Digitali (now Eutecne): integrated system for optimised handling of power sources onboard small and medium vessels;
- 54. SITA: UV-systems for drinkable water disinfection;
- 55. SITEM: innovative microscopy system that integrates OM (xmitted+fluorescence), AFM (atomic force), and MEA (micro-electrode array) for *in-vivo* cell investigation;
- 56. Softeco+GenovaRobot+Sogegross: automated "transpallet" for fresh food handling at stores;
- 57. TechCom: SeaSpoon an innovative (Sea) Wave Energy Converter (patented);
- 58. Tecnidro: new generation water flow meters with electronic (digital) counter;
- 59. Teknit: electric scooter "EcoJumbo" and battery charge device;
- 60. Tema Costruzioni: photovoltaics and thermodynamics for renewable energy;
- 61. ZenaCalor: R&D on coupled photovoltaic and water heating panels.

#### Annex 6 - Experience in IPR matters

#### 6.1 Laben IPRs

Among other Marketing/Sales/Contracts tasks: draw up at bid time, formalise as an integral annex to the contract, and maintain throughout the project, a list of all contractor's own (or third Parties') background IPR (whether patented or not) that are exploited for the purposes of the project, as well a list of foreground IPR developed under the project, according to the General Clauses&Conditions for ESA Contracts as amended case by case. In particular for the Galileo programme, manage the "escrow" facility for software source code.

The same mutatis mutandis for Italian Space Agency's projects (under a substantially different IPR regime).

The applicant during his 33-years employment with Laben (now: Thales Alenia Space) first as an engineer, then as a project manager, and finally as Head of Marketing & Sales (including Contracts administration, Security Officer and Export Licenses manager) was deeply involved in IPR matters.

It should be noted that institutional space programmes, typically in science, remote sensing, microgravity, and experimental telecommunications, invariably involve a fair share of research and "non-recurrent engineering" at various levels (piece part devices, equipment, software,...) whereof the IPR *régime* is ruled by the General Clauses & Conditions for ESA Contracts. Commercial space programmes, in turn, most often do exploit, with minor changes, the design available from such previous developments, in particular at equipment level.

The Space Agencies ASI and ESA follow slightly different policies in that respect:

- ESA (European Space Agency) in its own programmes, notwithstanding the fact that it does pay for R&D work (cost+profit) in general (remarkable exception is Galileo, because it is managed by ESA on behalf of the EC, and consequently is subject to a tighter IPR regime) grants title in IPR to the "final" Contractor (by-passing altogether the "prime" and any intermediate contractors) under certain conditions:
  - ESA requires prior notice of any initiative by the Contractor to protect its foreground know-how by patent, where it would not interfere;
     should however the Contractor fail to do so, if ESA nonetheless deems that the Contractor's foreground know-how is worth patenting,
     ESA would take the lead and patent it, as it does for its own know-how;
  - ESA reserves the right to buy again, for its own space programmes, the same or derived equipment from the same Contractor at the
    very recurrent manufacturing price (cost+profit) determined on the basis of labour rates, overheads etc. approved by its Cost Analysis
    division, thus leaving no room for any Contractor's own price policy; however, should the original Contractor fail for whatever reason,
    ESA will look for another to take over, under a compulsory license;
  - ESA requires prior notice for the same equipment to be sold to other (commercial or institutional) Bodies, unless these enjoy a cooperation agreement with ESA, and reserves to grant or withhold its clearance; also, if this is granted, ESA reserves the option to
    apply royalties (which as a matter of fact are most often waived);
- for the said reasons, in order to protect both its own interests and the Contractors', ESA took the habit of asking Contractors to:
  - issue a recapitulative statement, in any tender, of the "background" know-how (whether patented or not) that the Contractor intends to re-use and embed in the new development;
  - o in some programmes e.g. Galileo, file all of its sensitive relevant know-how (including all manufacturing details, piece parts lists, software source code, test procedures etc.) at a public "escrow", who will lock it and keep secret in a safe, unless the Contractor fails to honour its commitments: in which case the escrow will open the file to ESA for re-production by another Contractor at its discretion.
- ASI (Agenzia Spaziale Italiana) in general follows similar criteria; however, formally ASI reserves the title in IPRs to itself.

A well-behaved ESA Contractor like Laben must strictly comply with the above rules, and make sure so do its prime- and sub-contractors, too. More specifically, both in the very space market, and in view of developing Laben's business in a broader market, the undersigned applicant was tasked with the promotion and exploitation (including, where convenient, granting licenses to other manufacturers) of the following IPRs:

- 1. patents by Laben's Proel division (formerly Proel S.p.A.) (see http://www.patentgenius.com/assignee/ProelTecnologieSpA.html) as to:
  - applications of medium energy (200keV÷1MeV) electron beams, generated typically by a linear RF accelerator, for "curing" i.e. polymerising the resin matrix of composite materials, typically carbon- or kevlar-fibers, without vacuum-heating, thereby yielding a more accurate shape, gas-tightness, and superior mechanical properties, e.g. for spacecraft structures, booms, and propellant tanks; this included prospective applications (including the setup of pilot plants using Laben's own electron accelerator) of electron beams for "cross-linking" conventional polymers, e.g. polyethilene; sterilising plastic bags for medical use; etc.
  - o ion thrusters for spacecraft propulsion.
- 2. patents by Laben HQ itself, in various fields among which:
  - "Grazing incidence co-axial and confocal mirrors" patent n° US5592338 A, filed March 3<sup>rd</sup>, 1995: a unique technology for X-ray space imagers, using a lightweight yet stiff supporting structure made of porous synthered SiC: this patent was filed by prof. Oberto Citterio, a researcher with Osservatorio Astronomico di Brera (OAB) and then acquired by Laben for industrial exploitation;
- 3. know-how (technical and commercial) developed for new products in the naval field, such as the Ship [safety] Management System (SMS) already installed onboard FinCantieri's Hull#5956, and the forthcoming Ship Bus System (SBS): owing to a new re-focus in the space core business, on request by the holding FinMeccanica, the undersigned applicant was tasked to find licensees: after extensive market search, the Company AEG-Martec (already well acquainted with the product through its subsidiary ASIC) expressed a keen interest in the frame of its established naval core business: consequently Laben agreed to license to it the whole product and sales portfolio, against fair royalties.

#### 6.2 Ital Elettronica's patents exploited by SkyTech under a de facto license.

The Italian Navy, as agreed with the Greek Navy which undertook to build a "Classe Etna" ship, requested Ital Elettronica to supply, through the shipyard, a production lot of its unique "RV12-C" gamma-ray doserate sensors. However, Ital Elettronica itself was un-able to do it due to industrial

and financial burden, also because obsolescence of key components implied a heavy re-design of both hardware and firmware, and a new product type-approval. Bearing in mind the threat of the Compulsory License i.e. "*licenza obbligatoria*" under Art. 70 of the Italian Industrial Property Code, Ital Elettronica proposed to the Navy to transfer the deal to SkyTech, which thus got the contract from the Greek Elefsis shipyard directly instead of Ital Elettronica. In turn, Ital Elettronica co-operated as a sub-contractor to SkyTech for technical assistance in the re-design phase, as well as for calibration of the new probes against a known <sup>60</sup>Co source at its underground test facility in Rome.

The gamma-doserate meter subject of the deal embedded basically two patents (not counting multiple filings in Italy, Europe, USA etc.):

- the measurement principle, which caters for a very broad dynamic range (7÷8 decades) with a single Geiger-Müller tube, by switching automatically from "counting the events per unit time" (at low-medium rates) to "measuring the time from a fresh start after quench until the first event" (at high rates): a quick quench (high voltage cutoff) upon the first event detected minimises the dead time and the "pile-up", improves accuracy (because the measurement cycle can be repeated more often) and substantially extends the GM-tube life;
- the built-in calibration device, that exploits a weak and harmless beta-source (40K) normally hidden behind a metal shield, which can be brought in front of the GM-tube thin window as and when required, by means of a motorised arm.

The new product - along with the rugged display unit - was given a SkyTech part number "RV33" and was advertised in SkyTech's catalogue.

The question arose later on, whether SkyTech may freely exploit the new product as "its own" without applying for a further license and paying fees. The Board tasked the undersigned applicant, as legal representative, to sort it out. After extensive consultation with a lawyer (not a patent attorney) the answer was "yes it may" since Ital Elettronica, by transferring the contract as a whole, and by its positive behaviour, did grant a *de facto* license which, in absence of whatsoever expressed boundaries (and of any later claims after delivery) is deemed to be un-constrained in time and scope.

NB: the applicant at that time still acted as a Business Coach with SkyTech - only years later he joined it as a partner in full title.

#### 6.3 SkyTech's mark on PCBs

An industrial Customer, who had some electronics equipment developed and manufactured by SkyTech, allowed himself to stick his own label on SkyTech's printed circuit boards (PCBs) hiding SkyTech's mark (which could not be removed, being etched in the copper layer); SkyTech's staff noted it upon a post-delivery troubleshooting intervention.

Admittedly (i) SkyTech's mark was un-registered, and un-protected by Law; (ii) the terms of the purchase order were not very sharp as to labelling: apart from matters of opportunity (the Customer had enjoyed a public grant, in theory aimed to strictly in-house R&D, without sub-letting any part) that's why, after some discussion internal to the Board, SkyTech did not raise a claim this time.

However, it was decided to register SkyTech's mark (as a "graphic mark" owing to the proprietary text "ST - SkyTech" jointly with the specific font) in order to enjoy future protection. The undersigned applicant took care of that at the Chamber of Commerce in Milano.

#### 6.4 SkyTech vs. Getty Images

Upon its establishment in 2000, SkyTech had its website <u>www.skytechnologies.it</u> designed new by a local software house. As agreed, this delivered a website with fine-looking background images taken from space science and technology, astronomy etc.

Late in 2009, Getty Images claimed (by e-mail) as much as 6.000€ for overdue copyright fees, alleging its title in these images, one by one in a detailed list, plus a yearly fee should SkyTech wish to continue using them in the future. This was presented as a transaction, without which Getty threatened to undertake a much heavier legal dispute.

Owing to the specific character of such claim, since SkyTech's Statute reserves legal disputes to the Board, the undersigned applicant as chairman called a Board; and, being also legal representative, was tasked to sort out the matter.

The following considerations arose:

- 1. SkyTech acquired those images indirectly, i.e. through a software house, in all good faith, with the understanding, as usual in any business transaction, that the seller gets, and transfers to the buyer, any required clearances, licenses etc. embedded in the product or service, and holds him harmless from any third party's claims; hence, in principle SkyTech could turn any claims against the software house; however, as things had evolved in ten years, there was no hope to obtain either any assistance in withstanding Getty's claims, or any refund should SkyTech pay Getty; therefore SkyTech had to bear the burden as its own;
- 2. Getty cited its own image inventory numbers, but did not cite any registration number with S.I.A.E. (*Società Italiana degli Autori ed Editori*) whereas everybody knows that, in order to enjoy legal protection in Italy, such immaterial assets must be registered with S.I.A.E.: this raised the suspicion that Getty's claims were groundless, at least legally; on the other hand however, it would be virtually impossible for SkyTech to positively prove that no such registration existed with S.I.A.E., owing to the huge amount of records (thousands or millions);
- 3. the images, as shown in SkyTech's website, bore no "watermark" of Getty's, logo, © or ® or ™ or whatever, whereas a watermark was obvious even in the low-resolution preview browsing Getty's website: this raised the further suspicion, that Getty had sort of "put its hat" at a certain point in time, on images that had been freely available on the web for years, hence its claims would be also factually groundless;
- 4. Getty could hardly prove before Justice the alleged infringement, because just a "shapshot" unilaterally made by Getty would not be worth as evidence, as it could be easily forged; the only viable proof would be for Getty to ask a Notary to make the snapshot, at a well-defined date, and keep it in a safe for future use, as Justice would trust the Notary; but we deemed that, owing to the huge number of businesses Getty must have approached the same way as they did SkyTech, this would be very time-consuming, expensive, and unlikely to occur.

After an interview between the undersigned applicant and SkyTech legal counsel (lawyer) it was agreed to "spot the bluff": i.e. to remove at once all "offending" images from SkyTech's website, and turn a deaf ear to Getty's previous and future claims. Period! this was the happy end of the affaire.

#### 6.5 Own patent applications

Owner of two patent applications, respectively:

- MI2012A000678: household appliance for full-electric car recharge;
- MI2012A000717: occupational health & safety (OHS).

To item #1, UIBM's examiner objected an alleged lack of "sufficient disclosure" (EPC art. 83, Italian CPI art. 51) and was not satisfied by an "interlocutory" technical *addendum* (which improves the description without affecting the claims); a formal appeal by the applicant was finally dismissed at a hearing session held in front of the Court of Patents Appeal in Rome (same building as UIBM, 1st floor) on the ground that "it had not been formally notified to the counterpart UIBM itself" as per Code of Civil Procedure, although it had been materially notified by registered mail with proof of receipt, and the UIBM manager in person attended the hearing.

To item #2, UIBM found the application adequate for submitting to the EPO for prior art search; EPO objected and proved that prior art indeed existed (mainly US-patents) for at least some of the claims; the application was thus abandoned

### Tasks / skills:

- contents of the technical invention
- self-drafting of patent application including description and claims, with minimum recourse to IPR consultant (limited to the free support
  offered by the Chambers of Commerce) and without resorting to a patent attorney
- appeal against the first UIBM decision to item #2 before the Court of Appeal in Rome (public hearing held September 22<sup>nd</sup>, 2014

#### Annex 7 - Letters of credentials issued by Customers for previous Business Coach services

Here follow three letters of credentials issued by industrial Customers of previous Business Coach services (Magnetek, Self-Express, and SkyTech) performed by the undersigned applicant, as delivered to EASME under the first registration round as Business Coach (November 2014).

To whom it may concern

#### STATEMENT

Re: "Call for expression of interest for setting up of a list of coaches for coaching activities in connection with the SME Instrument", §4 "Information and documents to be provided"

With reference to the requirements set forth by the aforementioned Call, I undersigned, dr. ing. Antonio Canova, born on 1942 May 21 .... in Viareggio.(LU)..., am pleased to state that in the timeframe 2006÷2007 dr. ing. Maurizio Forcieri, in a team of two business coaches, actively supported the then Magnetek S.p.A., an industrial business based in Terranova Bracciolini (Arezzo - Italy) specialising in professional power electronics, whereof I was then Managing Director (as well as head of the Magnetek Group worldwide) in submitting an unsolicited R&D proposal to the Italian Ministry of Defense's PNRM (Piano Nazionale di Ricerca Militare) for fuel cells applications for the Army, with main emphasis on small "tactical" devices for individual soldiers.

An all the more challenging roadmap, as both product (fuel cells) with its innovative technology, and market (Defense), were new to Magnetek. (Synergism with Magnetek's existing business was also in the potential use of fuel cells for local storage of excess power in renewable energy plants).

Mr. Forcieri's tasks consisted mainly, but not exclusively, in: overall survey on the state of the art (industry and research) in fuel cells; survey on fuel cells applications planned or deployed by other MoDs; application scenario for the Italian Army, bearing on mind the increasing role of electrical equipment; unique technical requirements and challenges (small size, operations at any attitude, fuel supply logistics, ...); estimate of the attainable market, inputs to SWOT analysis, business plans etc.

It is worth noting that the PNRM does not issue procurement ITTs with top-down specs, but may endorse unsolicited proposals for partly self-funded R&D projects: it is thus essential for industry first of all to specify the requirement and provide a credible motivation both for the Customer MoD, and for itself, to invest the respective shares and "make" in Italy rather than "buy" abroad: hence, an appropriate "delivery" of the subject matter in the respective sections of the proposal is crucial.

Indeed thanks to, among others, Mr. Forcieri's contribution, Magnetek was awarded the contract.

In conclusion I gladly state that Mr. Forcieri did successfully act as a business coach for Magnetek.

However, as the Commission may already be aware of, a few years later, Magnetek was taken over by new shareholders, under the new trade name PowerOne (with new management), focusing more and more onto the emerging core business of DC-AC inverters for renewable power (mainly solar); and more recently PowerOne was further acquired by the ABB Group. Consequently, Magnetek's headed notepaper - the one on whose behalf I had power to sign - legally does not exist anymore: nevertheless, the Recipient will appreciate that this statement although made on plain paper is fully representative of the situation then in force.

Faithfully Yours

dr. ing. Antonio Canova - former Magnetek's MD

Automia Canida

SIEILIF IEXIPIRIESS di Vittorio

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: 694313 Na

To att:

Dr. Ing. Maurizio Forcieri Piazza Gramsci 4 20835 Muggiò (MB)

# Object: Reference Confirming Industrial Management Skill and Project Management Capability of Mr. Maurizio Forcieri

**Reference:** Call for expression of interest for setting up of a list of coaches for coaching activities in connection with the SME Instrument",

With reference to the requirements set forth by the aforementioned Call, I undersigned, dr. ing. Vittorio Savarese, born on 09/02/1951, in Naples, Fiscal Code **SVRVTR51B09F839U**, partner and CEO of the Naples-based company SelfExpress S.a.s., am pleased to state that, during 2012, thanks to a connection through IBAN (the Italian Business Angels Network) to whom I had addressed my business plan, I was approached by dr. ing. Maurizio Forcieri, an IBAN member, who offered his support in my business development effort.

Apart from seed capital or otherwise funding (as it is often the case with BANs) I was looking for a credible hardware manufacturer partner, complementary and synergetic with my own business, and willing to invest on its own share of work, in order to jointly approach industrial Customers, such as industrial vehicle manufacturers, that need suppliers with a balanced capability of hi-tech R&D and series production of, broadly speaking, reliable and long-lasting professional electronic devices (more specifically, precision navigation GPS Receiver) with preference to those already qualified by the [Italian] Ministry of Transportation for in-house manufacturing and test of automotive electronics.

Mr. Forcieri, also thanks to his previous employment with space industry, had a good knowledge of the technology and of the market, after a proper analysis of the requirements of the product, of the key competence to realize this result, addressed me to the right (small, but qualified enough) company, which showed indeed a keen interest.

Further steps took place under a partnership & confidentiality agreement between the Companies (Mr. Forcieri need not be part to it: as a business coach, he was already bound to confidentiality) recognising Self Express as the business leader for a first range of nominated Customers, whereas more generally the leader is the one partner who, case by case, brings the business opportunity.

We (the company's CEO and technical director, and myself) jointly met prospected Customers: and we found them well aware of the potential for precision navigation, but still not all the way through their "make-or-buy" tradeoffs; and also due to the low ebb in consumer spending and investments, any decision was withheld. However, this should not be regarded as a failure by the business coach: although shared with partners, the business plan was essentially mine, and Mr. Forcieri's advice was mainly relevant to the search for an appropriate partnership on the supply side.

In conclusion I gladly state that Mr. Forcieri was a successful business coach for SelfExpress project..

Faithfully Yours

on behalf of SelfExpress S.a.s.

CEO dr. ing. Vittorio Savarese

di Vittorie Sayarese 8. Lucia, 15 - 80132 NAPOLI



## **Electronics Technologies**

## To whom it may concern STATEMENT

Re: "Call for expression of interest for setting up of a list of coaches for coaching activities in connection with the SME Instrument", §4 "Information and documents to be provided"

With reference to the requirements set forth by the aforementioned Call, I undersigned, dr. ing. Alessandro Carbone, born on June 27<sup>th</sup>, 1963 in La Spezia (Italy), founder, partner and CEO of SkyTech S.r.l., an industrial business based at La Spezia, am pleased to state the following:

Early 2000, my previous business Elettromare S.r.l. needed some reorganisation for several reasons: one partner, also employed as technical director, resigned, and wanted to have his shares refunded; both technical burden on one side, and market opportunities and threats on the other, were growing; last but not least, the old seat was too isolated from the industrial logistics context of the town.

I was compelled to focus on co-ordination of in-house technical work, and avail myself of external support for business development; and I needed new partners with fresh equity. Thanks to his long Marketing and Sales experience in hi-tech professional (space & nuclear) electronics industry, and to our previous personal knowledge, dr. ing. Maurizio Forcieri was in a good position to help me.

We transferred all Elettromare's operational branch to a newly established company SkyTech S.r.l.; left the older estate (still under loan and mortgage) with Elettromare; and hired - and later acquired - a flat in the new industrial estate (*Centro di Sviluppo Tecnologico*) reserved for hi-tech SMEs.

Maurizio was still employed elsewhere and, in order to avoid conflicts, not yet in a position to join SkyTech as a partner in full title - we both agreed to postpone this further step - but in the meantime he financed the new SkyTech with a personal loan on account of future shares, and helped find new opportunities in line with my (and his own) current business relations.

Among numerous connections established by Maurizio since, perhaps the first (2002) and foremost was the acquisition of a contract for the supply (after the required delta-engineering) of gamma-ray probes to NATO standards to the Elefsis shipyard for a Greek Navy's ship to be built by agreement with the Italian Navy like FinCantieri's "classe Etna". A similar probe existed and had been made in small series by another Italian company, but this way was not practicable for several reasons:

- key components (microprocessor, power converter,...) were obsolete and consequently the
  electronics modules (as well as the embedded firmware) had to be thoroughly re-engineered and
  tested: hence, compliance with Elefsis' and NATO's performance and environmental requirements
  had to be verified again,
- the original designer-manufacturer company was in a rather critical financial and industrial situation (owing to delayed cash flow due to late system deployment by the prime contractor under a previous large contract with the Italian *Ministero degli Interni* (= Home Office) and was materially unable to undertake such a demanding new contract.

Being aware of that, and ready to exercise its prerogatives under the Law, the Navy wanted a new suitable contractor to take over: by mutual agreement, thanks to introduction by Maurizio, SkyTech was deemed to





## Electronics Technologies

be up to it, and got the contract (directly from Elefsis shipyard) together with IPR and title in the new product. The contract was executed very smoothly, also because, in this friendly takeover, the original designer-manufacturer had no choice but support (as a supplier) SkyTech.

When I found a new candidate partner and technical director, although an old friend and schoolmate of mine, with an outstanding experience in design and management of hi-tech electronics for the Navy, before any final decision I asked Maurizio to interview him and get acquainted with him.

In conclusion I gladly state that Maurizio was a useful business coach for SkyTech: and in 2008, when he retired from his previous job with space industry, we gladly welcomed him as a third partner within SkyTech (each with shares 1/3 and peer rights) and elected him Chairman of the Board and legal representative. Maurizio also helped set up new governance rules for SkyTech, emphasizing the role and the required consensus of the Board in all matters of high relevance.

Apart from his formal duties, Maurizio is however not an employee (unlike the two of us) but a free-lance engineer: consequently, even today, and even without a consultancy contract, I'd qualify his most creative contribution to SkyTech as ongoing "business coaching". For instance, in 2012 he filed industrial patent applications on his own and then, capitalising on that, on behalf of SkyTech drew up unsolicited proposals to seek the co-funding required for product R&D from the Agencies.

La Spezia, November 19th, 2014

Faithfully Yours

on behalf of SkyTech S.r.l.

dr. ing. Alessandro Carbone, CEO