



SME / Association / Researcher Profile Form



FP7 Programme SECURITY Theme

Date (dd/mm/yyyy): 2110/2009

Profile valid until (dd/mm/yyyy): 31/06/2011

Section 1 - Contact details

Organisation Name (full name)	National Institute for Aerospace Research "Elie Carafoli"
Organisation acronym (Abbreviation)	INCAS
Address	220 Iuliu Maniu Bdv
Postal code	061099
City	Bucharest
Country	Romania
www address	http://www.incas.ro/

Contact person:	
Title	Dr.
First Name	Adriana
Family Name	Stefan
Telephone	(+40) (0) 21 434 01 53
Fax	(+40) (0) 21 434 00 79
E-mail	adriana@incas.ro

Section 2 – Type of organisation

If you are an Enterprise

Enterprise type	<input type="checkbox"/> Private <input type="checkbox"/> Non profit	Is your Company a Small-Medium sized Enterprise (SME)?	<input type="checkbox"/> YES <input type="checkbox"/> NO
	<input type="checkbox"/> Public <input type="checkbox"/> Other	if YES, Number of Employees	<input type="checkbox"/> < 10 <input type="checkbox"/> > 10 and < 50 <input type="checkbox"/> < 250
<p>According to Article 2 of the annex of Commission Recommendation 2003/361/EC of 6 May 2003, which applies from 01 January 2005, an SME (Micro, Small or Medium-sized Enterprise) is an enterprise which:</p> <ul style="list-style-type: none"> • has fewer than 250 employees, • has an annual turnover not exceeding 50 million euro, and/or • an annual balance-sheet total not exceeding 43 million euro. <p>http://europa.eu.int/comm/enterprise/enterprise_policy/sme_definition/index_en.htm</p>			
Owned by a non SME:		<input checked="" type="checkbox"/> YES <input type="checkbox"/> NO	
Description of the organisation (max 1.000 characters):			



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If you are an Association

Association type	<input type="checkbox"/> SME <input type="checkbox"/> Industrial <input type="checkbox"/> Cultural <input type="checkbox"/> Civil society <input type="checkbox"/> Other:	Sector of activity	
Description of the association (max 1.000 characters):			

If you are a research organisation

Research Organisation type	Research Organisation (<input type="checkbox"/> Private <input checked="" type="checkbox"/> Public) High Education School / University / Institute (<input type="checkbox"/> Private <input type="checkbox"/> Public) <input type="checkbox"/> Other, please specify:
Description of the organisation (max 1.000 characters):	
<p>The National Institute of Aerospace Research "ELIE CARAFOLI" is a company in Romania which develops for the aerospace industry a research activity on the whole cycle, starting from the main basic-oriented research, going on with the applied research and finishing with the technological development and the implementation of the obtained production results.</p> <ul style="list-style-type: none"> • The basic research developed by INCAS aims to increase the knowledge level in the aerospace and aeronautical fields, referring to the General Aerodynamics, Flight and Systems Dynamics, Aerospace Structures, Aeroelasticity, Resistance of Materials applicable in Aeronautics, Aerospace propelling systems. • Applied research-technological development which represents the specific of the institute refers to the achievement of aerospace technologies and materials; experimental models in the aeronautical and aerospace fields, testing benches and installations, platforms and pilot stations, laboratory apparatus. 	

Section 3 – Sector of interest

Further information on the sector of interest (max. 500 characters)	Security and safety of aviation against attacks (e.g MANPAD, EMP, microwave-weapons, virtual radar, etc)
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Research topic according to the work programme	Topic 10.2.4.-1 New concept to meet the requirements for the protection of civil/commercial aviation
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Section 4 - Description of your expertise

Description of the expertise (max 2.000 characters)	<p>Research and development of advanced composite materials for aerospace industry:</p> <ul style="list-style-type: none"> • Carbon fiber technology with performant mechanical properties for aeronautics on laboratory installation conceived and made by INCAS: filament diameter- 7 μm, 6000 filaments (6K), tensile strength = 3100 MPa, tensile modulus = 240 GPa, ultimate strain = 1.3%; • Carbon fiber/ epoxy matrix composites: flexural Strength = 650 MPa, flexural modulus = 25 GPa, drive friction coefficient = 0.3; • Carbon-carbon composites : flexural strength = 200 MPa, flexural modulus = 100 GPa ; • Hybrid metal/fiber composites GRAAL type: <ul style="list-style-type: none"> - Aluminum/Glass Fibre: flexural strength =170 MPa , flexural modulus = 6300 MPa, - Aluminum/Carbon Fibre: flexural strength = 250 MPa, flexural modulus = 8600 Mpa; • Nanocomposites MWCNTs/ epoxy matrix: flexural strength = 140 MPa, flexural modulus = 2800 MPa; • Nanocomposites montmorillonite/ epoxy matrix: flexural strength = 100 MPa, flexural modulus = 1800 MPa. • Isotropic composite materials in electrical terms and electromagnetic radiation absorbing materials.
Keywords describing the expertise offered (please complete as required)	<p>1. Detection; EMP; security; electromagnetic, shielding; low observability technology; microwave absorbants, dielectric, ferromagnetic.</p> <p>2. transport, aerospace, avionics, civil, space, industry, vehicle, plane.</p> <p>3. nanotechnologies, multifunctional, materials, carbon, nanotubes, nanocarbon, ferrites, composite material.</p>

Section 5 – Your previous experience in FP projects

Former participation in FP European projects?	<input type="checkbox"/> YES <input checked="" type="checkbox"/> NO
If YES (please specify)	<p>Project title:</p> <p>Acronym:</p>



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Activities performed	<input type="checkbox"/> Research <input type="checkbox"/> Demonstration <input type="checkbox"/> Training <input type="checkbox"/> Technology <input type="checkbox"/> Dissemination <input type="checkbox"/> Management <input type="checkbox"/> Other:
Please describe briefly your role in the project (max. 700 characters):	

Section 6 – Expectations

Term commitment	<input type="checkbox"/> Short (< 1 year) <input checked="" type="checkbox"/> Medium (1 to 3 years) <input checked="" type="checkbox"/> Long (more than 3 years)
Commitment offered	<input checked="" type="checkbox"/> Research <input checked="" type="checkbox"/> Demonstration <input checked="" type="checkbox"/> Training <input checked="" type="checkbox"/> Technology <input checked="" type="checkbox"/> Dissemination <input type="checkbox"/> Management <input type="checkbox"/> Other:
Proposed role in the project	<input type="checkbox"/> Coordinator <input type="checkbox"/> Work package leader <input checked="" type="checkbox"/> Partner <input type="checkbox"/> Other role:
Expected results for your organisation (max 500 characters)	

Section 7 – International cooperation

Are you interested in international cooperation?	<input checked="" type="checkbox"/> YES <input type="checkbox"/> NO
If YES, Please specify the geographical area(s) of interest	<input checked="" type="checkbox"/> Mediterranean area <input checked="" type="checkbox"/> Balkan area <input checked="" type="checkbox"/> Russia and NIS (Newly independent States) <input checked="" type="checkbox"/> Asia



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	<input checked="" type="checkbox"/> Africa <input checked="" type="checkbox"/> South America <input type="checkbox"/> Other:
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In respect to the Directive 2002/58/EC of the European Parliament and of the Council of 12 July 2002 Right to the Protection of Personal Data, I authorize the use of my personal data

PLEASE COMPLETE AND RETURN IT TO: