

**Rede Nacional de Computação Avançada - Fundação para a Ciência e Tecnologia, I.P.**

**Candidaturas aprovadas no Concurso para Projetos de Computação Avançada FCT/CPCA/2022/01 (3ª Ed.) - A2 Acesso Projeto ou Regular  
Listagem de resultados preliminares A2 (por painel científico)**

São apresentadas as seguintes listas ordenadas de candidaturas por painel segundo os critérios definidos no aviso de abertura do concurso (ver legenda no final):

P1 – Physics and Mathematics						
Referência	IR	Título / Title	Nota Final	Plataforma	Centro Operacional	Recursos atribuídos
2022.15813.CPCA.A2	Sérgio Domingos	Probing structural dynamics of artificial molecular machinery using microwave spectroscopy	9,83	Navigator	LCAUC	100%
2022.15892.CPCA.A2	Orlando Oliveira	High statistical lattice computation of propagators and vertices in Landau gauge	9,75	Navigator	LCAUC	100%
2022.15804.CPCA.A2	Miguel Zilhao	Dynamics of bosonic stars	9,68	Navigator	LCAUC	75%
2022.15885.CPCA.A2	João Lopes	Numerical Tests of a Superfluid Effective Field Theory in the 3d O(2)-model.	9,23	Cirrus	INCD	75%
2022.15822.CPCA.A2	Pedro Borlido	Ab initio search for practical superconductors	9,22	Navigator	LCAUC	75%
2022.15760.CPCA.A2	António Júnior	Dynamical spin-charge coupling in van der Waals nanostructures	8,98	Cirrus	INCD	75%
2022.15832.CPCA.A2	Estelina Lora da Silva	Reaction mechanism of HYDROgen evolution CATalysed by low-dimensional systems (RHYDROCAT)	8,84	Oblivion	HPCUE	75%
2022.15672.CPCA.A2	José Coutinho	Light and elevated Temperature Induced Degradation of n-type Solar Silicon: Pitfalls and Remedies	8,81	s/r	s/r	s/r
2022.15571.CPCA.A2	Gareth Williams	Shining Light on Solids: Understanding Light Bursts from Ultrafast Laser-Driven Electron Motion in Solids	8,74	s/r	s/r	s/r
2022.15826.CPCA.A2	Manuel Franco	Exploring Novel Organic Materials for Electronics	8,37	s/r	s/r	s/r
2022.15881.CPCA.A2	Carlos Reis	Opto-electronic and electron-phonon properties of epitaxial Group-IV metamaterials	8,14	s/r	s/r	s/r
2022.15886.CPCA.A2	Miguel Araújo	Many-body quantum phases of moiré systems	8,04	s/r	s/r	s/r
P2 – Chemistry and Materials						
Referência	IR	Título / Title	Nota Final	Plataforma	Centro Operacional	Recursos atribuídos
2022.15888.CPCA.A2	Pedro Simões	Mechanisms of protection of lactic acid bacteria by fructo-oligosaccharides: a molecular simulation study	9,47	Navigator	LCAUC	100%
2022.15818.CPCA.A2	Alexandra Carvalho	Enhancement of Proteins to address Health Conditions	9,44	Cirrus	INCD	100%
2022.15575.CPCA.A2	German Sanchez	A coarse-grained molecular dynamic simulation framework to unveil the interactions between mixtures of diverse nature Pluronic in aqueous solutions	9,36	Oblivion	HPCUE	100%
2022.15802.CPCA.A2	Jose Gouveia	MXene-based transition metal single atom catalysts for nitrogen dissociation	9,20	Navigator	LCAUC	75%
2022.15882.CPCA.A2	Nuno Galamba	Parkinson's Disease and $\alpha$ -Synuclein Aggregation: A Coarse-Grained/All-Atom Molecular Dynamics Approach for Targeting a Cyclic Peptide Drug	9,06	Cirrus	INCD	75%
2022.15873.CPCA.A2	Rui Loureiro	Large-spectrum antiviral drug development for influenza: towards the minimization of seasonal outbreaks and the prevention of future pandemics	9,03	Navigator	LCAUC	75%
2022.15579.CPCA.A2	Maria João Ramos	Biodegrading unsaturated polyesters - establishing the enzymatic catalytic mechanism of Pseudomonas sp. MIS38 lipase	8,97	Oblivion	HPCUE	75%
2022.15697.CPCA.A2	Luis Loura	Enhancing membrane permeation of MRI contrast agents with molecular umbrellas	8,96	Navigator	LCAUC	75%
2022.15859.CPCA.A2	Iuliia Voroshylova	SiEs systems for safe and efficient energy storage: Multiscale Theoretical Approach	8,66	s/r	s/r	s/r
2022.15744.CPCA.A2	Luís Martins	Ionic hydrogels for technological applications—a molecular dynamics simulation study	8,42	s/r	s/r	s/r
2022.15709.CPCA.A2	Pedro Pacheco	Numerical modelling of erosive and abrasive wear in gas-solid cyclones within the CFD-DEM framework	8,29	s/r	s/r	s/r
2022.15850.CPCA.A2	Margarida Brito	Advanced computational design of novel chemical reactors	8,15	s/r	s/r	s/r
2022.15883.CPCA.A2	Jorge Marques	Can microsolvation stabilize repulsive interactions? A computational attempt to answer	7,96	s/r	s/r	s/r
2022.15794.CPCA.A2	Paulo Costa	Tackling halogen anisotropy with force field methods: a systematic validation of charge sets using alchemical free energy calculations	7,93	s/r	s/r	s/r
2022.15630.CPCA.A2	Nuno Bandeira	CO2 valorisation through quantum chemistry.	7,88	s/r	s/r	s/r
2022.15855.CPCA.A2	Alfredo Carvalho	PHARMASORB - Adsorbents for pharmaceuticals decontamination of water	7,66	s/r	s/r	s/r
P3 - Engineering and Technology						
Referência	IR	Título / Title	Nota Final	Plataforma	Centro Operacional	Recursos atribuídos
2022.15877.CPCA.A2	Carlos Silva	Investigation of the turbulent/non-turbulent interface in non-equilibrium turbulence by means of direct numerical simulations	9,29	Navigator	LCAUC	100%
2022.15851.CPCA.A2	Ana Zózimo	HIDRALERTA Plus	8,86	Oblivion	HPCUE	75%
2022.15647.CPCA.A2	Guilherme Vaz	Medium and High-fidelity Aerodynamic Models for Wind Farm Power Optimization	8,45	Navigator	LCAUC	75%
2022.15828.CPCA.A2	Shan Wang	Computational Fluid Dynamics (CFD) analysis of renewable energy devices	8,28	Cirrus	INCD	75%
2022.15876.CPCA.A2	António Muralha	High-Velocity Water Jets: Comparison between numerical and experimental data of the jet stream power	8,14	s/r	s/r	s/r
2022.15808.CPCA.A2	Carlos Couto	Development of physics-informed machine learning models for predicting the behaviour of steel structures	7,93	s/r	s/r	s/r
P4 – Life and Health Sciences						
Referência	IR	Título / Title	Nota Final	Plataforma	Centro Operacional	Recursos atribuídos
2022.15858.CPCA.A2	Vítor Sousa	Population genomics of hybridization and response to climate change: combining new bioinformatic methods with omics data from endemic Iberian freshwater fish	9,27	Cirrus	INCD	100%
2022.15827.CPCA.A2	Rui Figueira	Portuguese Biodiversity Data Portal and associated services to PORBIOTA RI user community	9,24	Stratus	INCD	100%
2022.15874.CPCA.A2	Irina Moreira	The influence of a known mutation into the stargazin/kv7.2 dynamics and function.	8,99	Navigator	LCAUC	75%
2022.15825.CPCA.A2	Bruno Nevado	Deleterious and compensatory mutations and their role in evolutionary radiations	8,86	Cirrus	INCD	75%
2022.15878.CPCA.A2	Miguel Machuqueiro	In silico study of peptidic dendrimers as transfection agents in RNA vaccines	8,72	Cirrus	INCD	75%

2022.15871.CPCA.A2	Patrícia Brito	Multi-omic approaches to study evolution of domestication in non-conventional yeasts	8,56	Cirrus	INCD	75%
2022.15805.CPCA.A2	Daniel Sobral	Capacity building in genomic epidemiology of viral threats through expansion of INSAFLU and training provision	8,53	s/r	s/r	s/r
2022.15891.CPCA.A2	Ines Isidro	Workflows for single-cell transcriptomics in human in vitro breast cancer models	8,45	s/r	s/r	s/r
2022.15845.CPCA.A2	Bruce Milne	Identifying multi-target cyclic peptide inhibitors of coronavirus cell entry	8,36	s/r	s/r	s/r
2022.15890.CPCA.A2	Hugo Martiniano	A Machine Learning Approach for Patient Stratification in a Whole Genome Sequencing Cohort of Autism Spectrum Disorder Patients	7,99	s/r	s/r	s/r

**P5 – Earth and Environmental Sciences**

Referência	IR	Título / Title	Nota Final	Plataforma	Centro Operacional	Recursos atribuídos
2022.15706.CPCA.A2	Roman Chertovskikh	Magnetic field generation by flows quasiperiodic in space	9,13	Obivion	HPCUE	100%
2022.15857.CPCA.A2	Anabela Oliveira	PERFECT - oPEncoasts as a Relocatable Forecast Engine for Coastal Digital Twins	9,06	Cirrus	INCD	75%
2022.15841.CPCA.A2	Alberto Azevedo	WORSICA: Water detection web service for coastal, inland and irrigation network applications	9,05	Cirrus e Stratus	INCD	75%
2022.15879.CPCA.A2	José Silvestre	AGRISPACE: Portuguese AGRiculture data SPACE	8,48	Stratus	INCD	75%
2022.15893.CPCA.A2	Paola Castellano	A Platform to environmental monitoring system: CoastNet Research Infrastructure	8,20	s/r	s/r	s/r
2022.15819.CPCA.A2	Ricardo Santos	HealthyCities - CFD modelling of urban flows: landscape and building design for outdoor and indoor air quality	7,91	s/r	s/r	s/r

**P6 – Social and Economic Sciences**

Referência	IR	Título / Title	Nota Final	Plataforma	Centro Operacional	Recursos atribuídos
2022.15824.CPCA.A2	Andre Peres	Deep-Cog: a Deep Neural Network for Abnormal Cognitive Decline Detection Based on Multimodal Data	8,71	Navigator	LCAUC	100%
2022.15869.CPCA.A2	Joana Gonçalves-Sá	PTPARL-D: Annotated corpus of Portuguese Parliament Debates	8,09	Stratus	INCD	75%

**Legenda da tabela**

<b>Referência</b>	referência FCT da candidatura.
<b>Título / Title</b>	Título do projeto no qual se insere a candidatura.
<b>IR</b>	nome do Investigador Responsável
<b>Nota Final</b>	Nota final atribuída à candidatura após avaliação técnica e científica de acordo com o Aviso de Abertura do presente Concurso.
<b>Plataforma</b>	plataforma atribuída à candidatura.
<b>Centro Operacional</b>	Centro Operacional atribuído à candidatura. LCAUC: Laboratório de Computação Avançada da U. Coimbra HPCUE: High Performance Computing da U. Évora INCD: Infraestrutura Nacional de Computação Distribuída
<b>Recursos atribuídos</b>	percentagem de recursos atribuídos face ao pedido na candidatura. <b>100%</b> : atribuição de 100% dos recursos computacionais solicitados na candidatura. De acordo com o aviso de abertura de concurso as 20% candidaturas mais bem classificadas terão até 100% dos recursos computacionais solicitados. <b>75%</b> : atribuição de 75% dos recursos computacionais solicitados na candidatura. De acordo com o aviso de abertura de concurso as 40% candidaturas mais bem classificadas, a seguir às 20% mais bem classificadas, terão até 75% dos recursos computacionais solicitados <b>s/r</b> : sem recursos computacionais disponíveis, sendo elegível para eventual alocação futura, caso venha a existir capacidade computacional adicional. <b>Não admitida</b> : não cumpriu os recursos mínimos para Acesso Projeto definidos no Aviso de Abertura do Concurso.