Introduction to the MSCA 2025 Doctoral Network Call

Information for proposal preparation

as coordinator or beneficiary

H.Pernegger, S. Stavrev, I. Haug, F. Pesce, L. Dalla Palma, R. Pennings

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The 2025 call

- Doctoral Networks
  - https://marie-sklodowska-curie-actions.ec.europa.eu/actions/doctoral-networks
  - collaboration of multiple organisations for research and training of PhD students (Doctoral candidates)
  - recruit max 15 MSCA doctoral students@ 36 person months (PM) per student (total 540)
  - **deadline 25 November 2025**
  - Step-by-step guide at https://marie-sklodowska-curie-actions.ec.europa.eu/actions/doctoral-networks/6-steps-to-prepare-your-application#1

Types of DN

Overview

		DN	DN-ID	DN-JD
BENEFICIARY (IES)	Minimum Number of beneficiaries	3	3	3
	Minimum MS or AC	3	3	3
	Minimum MS (beneficiaries)	1	1	1
	Academic sector	No restrictions	No restrictions	No restrictions
	Non-academic sector	No restrictions	No restrictions	No restrictions
	Max no. of person months	540	540	540
	Max 40.0% budget for 1 country/international organisation	Mandatory	Mandatory	Mandatory
Beneficiary or associated partner/associated partner linked to a beneficiary awarding PhD		Mandatory (beneficiary or associated partner/ associated partner linked to a beneficiary)	Mandatory (beneficiary or associated partner/ associated partner linked to a beneficiary)	Mandatory (please see minimum requirements for DN-JD)
Joint/double/multiple award of PhD		Optional	Optional	Mandatory (Researchers must be enrolled in a doctoral programme leading to the award of a doctoral degree in at least 2 EU MS/AC)
Joint/double/multiple degree – letter of pre-agreement		N/A	N/A	Mandatory
Joint supervision for researchers		Encouraged	Mandatory (from the 2 sectors)	Mandatory
Researchers enrolment in the PhD		Mandatory	Mandatory	Mandatory
Stay in non-academic sector		Encouraged	Min. 50% of fellowship duration	Encouraged
Secondments		≤ 1/3	No limitation	No limitation
Max Project duration		48	48	60
Fellowship duration		3-36 months	3-36 months	3-48 months
Ranking lists		8 (Scientific) panels		
Budget		~€435 Million		

- **For DN-ID :** 50% of time outside academia

Typical example

- Duration: up to 48 months
- Contract: 3-36 months
- Secondments: max 30% of the contract - we typically use e.g. 2x2mo

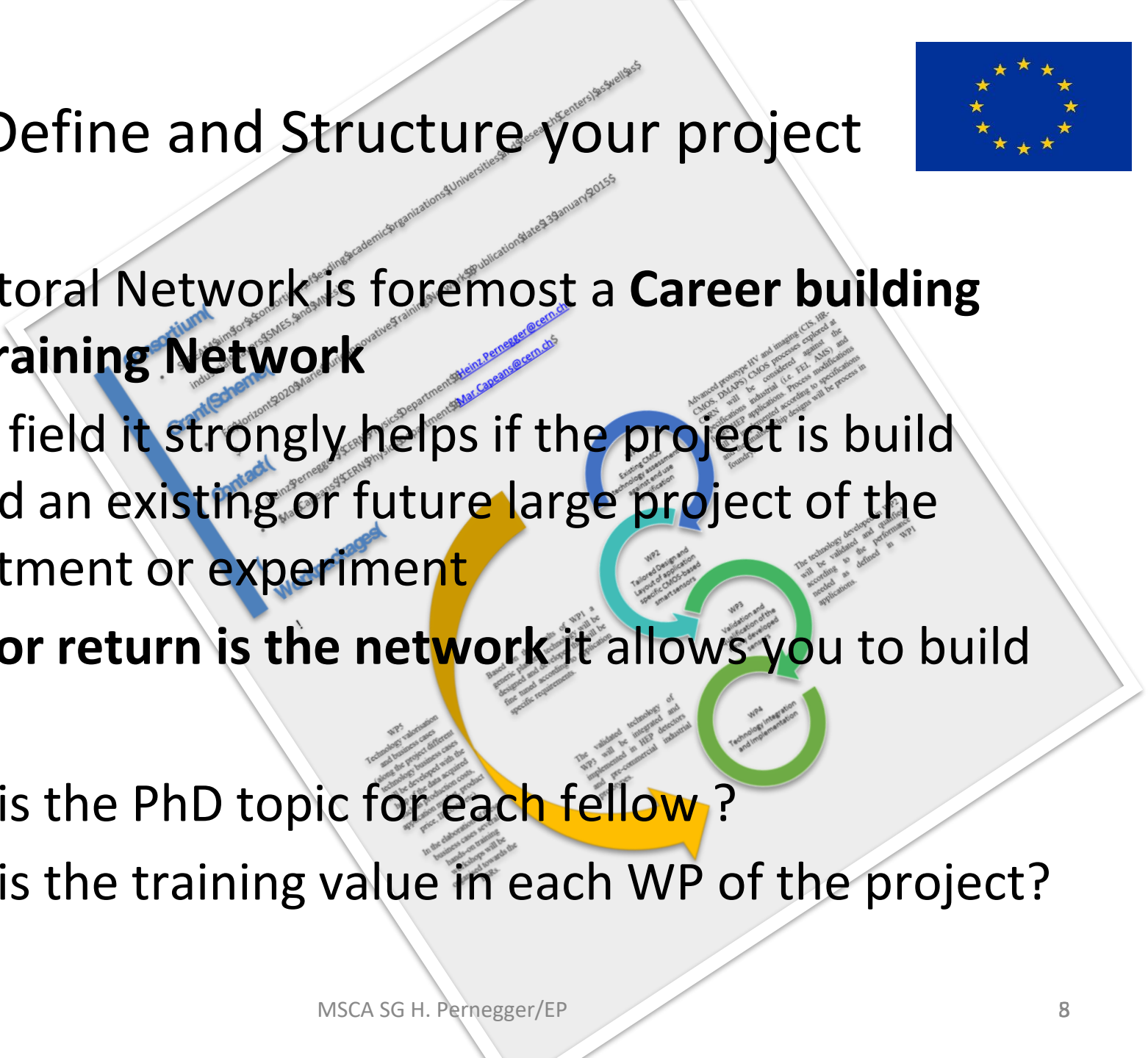
See slides about finances in DN in appendix

- Standard Doctorates: max. 540pm; Living allowance: EUR 4100
- Mobility allowance: EUR 710
- Family allowance: EUR 660
- RTN: EUR 1600 - common to allocate part for common network expenses
- Mgt and indirect costs: EUR 1200
- Long term leave allowance paid (maternity, paternity, sick leave)

Define and Structure your project

- A Doctoral Network is foremost a **Career building and Training Network**
- In our field it strongly helps if the project is build around an existing or future large project of the department or experiment
- A **major return is the network** it allows you to build

– What is the PhD topic for each fellow ?
– What is the training value in each WP of the project?



Guides for proposals

MCSA DN – some guides when developing your proposal

roy.pennings@cern.ch

MCSA DN =

* about career development of young researchers!
* is NOT a research project, nor a means to get free labour!

Career development = in MCSA

* a project in a research field that has a future (and can prove it!)
* not a niche area that leaves only very few career paths (or sectors).
* allows equally a career in academia OR in industry.
* includes scientific knowledge building + personal development (incl. non-academic skills, peer-to-peer, networking)

It is very difficult to be original in MCSA: pretty much everything has been tried.

- Show that you know that your project is about your students and not about you.
- Show that you understand that the students must have a real choice w.r.t. their future career (field, sector)
- Show that you have selected partners that really take responsibility + are good for student CV
- Position the project well, quantify the topic's urgency and potential.
- In impact: push the industrial partners to describe and quantify their future need for the skills hat the project will develop.

Guides for proposals

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Designing proposal =

* define an overarching research topic that covers overall CERN and partner ambitions.
* what is the positioning of the topic: why is it urgent and timely + why is it important that Europe does something about it?
* select partners carefully: what is the partners' need/pain in terms of future researcher capacity/skills in relation to the topic? Why will they also be good CV-references for the students?
* create 1-3 main research objectives (ROs) within the topic that act as coat-hangers for the individual researcher projects. These are also your WP1 and WP2(-3). Describe the 2-4 tasks per WP very briefly: what, how, what will be the result and where does the result go. Then you have WP management/recruitment, the WP on training, then WP communication. The student projects are in different table (3.1f)
* ask the partners to identify/define individual researcher projects that link to the overarching topic.
    - 0 Then discuss to find the common thread and identify crossovers/interdisciplinarity opportunities.
    - 0 Put the indiv. research projects into the ROs and show where there are interaction opportunities between the student projects.
    - 0 Use a table or diagramme: project, related indiv. projects, research questions, approach to highlight level of integration toward the topic
* include industry partners as core-partners, since proposal must show that you take career opportunities for students in industry equally seriously!
* build a serious training programme: lots of peer-to-peer exchange, added value of training with non-academic partners
* consider 'side aspects' seriously: IP management, measures to enhance career perspectives, strengthening EU research capacity, a added value of particular skills etc.

Training @ CERN

LEARNING @ CERN
... A PORTFOLIO OF OPTIONS

- CERN HR provides a large array of training opportunities for the fellows (both technical and career-building)
- https://indico.cern.ch/event/1289268/contributions/5447695/attachments/2664443/4617803/MC%20SteeringGroup_Learning%20at%20CERN_overview_06.2023.pdf
- CERN's (and your partner's) training portfolio is an ideal starting point to structure the training programme of a DN proposal

Recruitment of fellows

- Each beneficiary is responsible for their recruitment
  - however it helps greatly to organise the advertisement and interviews jointly
- Fellows recruited through HR following guidelines of MSCA call
  - see HR slides in appendix for more details
- Note the mobility rule (max 12 mo in past 3 years before contract start in the country of recruitment

Links to documentation

- MSCA 2025 call: MSCA doctoral networks
- Most important documentation is primarily available through Participant Portal
- Very useful - Quick-start Guide - with link to relevant MSCA official documentation
- CERN's registration for EU proposal on EDH
  - to be filled and approved before submission

Need more information?

- If you need information, assistance and/or input for your proposal:

- heinz.Pernegger@cern.ch (MSCA SG chair)
- ingrid.Haug@cern.ch (HR & recruitment)
- svetlomir.Stavrev@cern.ch (DG-EU office)
- external.grants@cern.ch (Florence & Laura FAP for financial questions)
- mandy.stewart@cern.ch (Legal matters)

- We are happy to provide input to your proposal and assist with proof-reading if requested

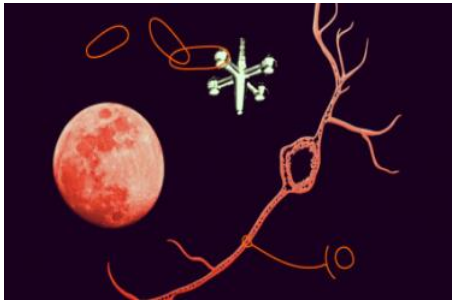
- **We are happy to setup one-on-one meetings with your colleagues if they are interested in preparing a proposal, participate on one or want to understand what is involved**
  - **email heinz.Pernegger@cern.ch & roy.pennings@cern.ch**

Appendix:
Advice for Recruitment , Financial planning, General DN information

Marie Skłodowska-Curie Actions

Developing talents, advancing research

DOCTORAL NETWORKS RECRUITMENT and ELIGIBILITY



Ingrid Haug – HR-PXE

Recruitment - Framework

- Open, efficient, transparent, supportive, internationally comparable, merit oriented and tailored to the type of position advertised, in line with the Charter & Code.
- Ensure that no conflict of interest exists.
- Recommendation to use a common recruitment platform for receiving applications + common recruitment practice.
- Advertising: international, all beneficiaries are to source as widely as possible. Publication on EURAXESS required by EC.
- Researchers of any nationality can be recruited.
- Encourage females applicants.
- Every beneficiary to verify with their own local eligibility and requirements.
- Recruitment strategy:
  - Implement what is described in the proposal.
  - Recommendation to have a Management Office responsible for the recruitment procedure and selection process in direct consultation with all involved network beneficiaries.

Recruitment – Researcher Eligibility

- Early Stage Researcher definition

  - at the date of recruitment*, must be in possession of degree giving access to PhD studies (=MSc)

  - the researcher must not have been awarded a doctoral degree => Advice: check diploma of selected candidate

  - must be in the first 4 years (full-time equivalent experience) of their research careers

- Mobility rule: The researcher must not have resided or carried out their normal activities in the country (or international organisation) in which the beneficiary is based for more than 12 months in the 3 years immediately prior to appointment

* DOR = First day of employment for the purpose of the action

For the EU the eligibility is key so this has to be carefully checked. Indeed costs will be rejected in case a candidate does not comply with the required eligibility.

RECRUITMENT - CONTRACT

- EC requires all ESRs to receive an employment contract
- Therefore '*Doctoral Student Contract*' not possible as this is 'contract of Association'.
- Consequently a contract under the new Graduate Programme is awarded
- Note : The Marie-Curie Fellowship is considered as CERN fellowship. No further fellow contract can be awarded since a Fellowship is a one in a lifetime possibility.

AFTER RECRUITMENT

- Recruitment Summary for every ESR to be written by hosting beneficiary (template is provided)
- ESR must work on an individual research project and exclusively (100%) for the action
- Employment contract for ESR: 36 months for all ESR, Full time employment (part-time only for family reasons), incl. health and pension cover. The contract must incl. provision from GA Art. 32.1 (f)
- Supervision and integration:
  - ❑Career Development Plan: Identify research aims and training needs
  - ❑Regular contacts, review progress, guide
- In case of issues with ESR: every beneficiary needs to implement their own admin. procedure

*This employment contract is offered in the context of the implementation of the **LISA** project in compliance with the Grant Agreement number **861198** concluded between the Research Executive Agency and CERN. The supervision will be ensured by **Bruce MARSH**. The following specifications according to **article 32.1 (f)** of the Grant Agreement apply:*

- *The obligation of the researcher to work exclusively on the action.*
- *The obligation of the researcher not to receive for activities carried out in the frame of the action, other incomes than those received from the beneficiary.*
- *The obligation of the researcher to inform the beneficiary as soon as possible of any events or circumstances likely to affect the Agreement.*
- *The arrangements related to the intellectual property rights between the beneficiary and the researcher — during implementation of the action and afterwards.*
- *The obligation of the researcher to maintain confidentiality.*
- *The obligation of the researcher to ensure the visibility of EU funding in communications or publications and in applications for the protection of results.*

MSCA Steering group - Financial information

Laurą Dalla Palma - Marie Skłodowska-Curie Projects under Horizon Europe

Doctoral Network

- Doctoral Networks call

MSCA Doctoral Networks	Contributions for recruited researchers per person-month					Institutional unit contributions per person-month	
	Living allowance	**Mobility allowance**	**Family allowance** (if applicable)	**Long-term leave allowance** (if applicable)	**Special needs allowance** (if applicable)	**Research, training and networking contribution**	**Management and indirect contribution**
	EUR 4010	EUR 710	EUR 660	EUR 4720 x % covered by the beneficiary	requested unit[133] x (1/number of months)	EUR 1600	EUR 1200

Rates according to WP

MSCA Doctoral Networks	Contributions for recruited researchers per person-month Minimum Gross salary of the ESR					Institutional unit contributions per person-month	
	Living allowance **1***	**Mobility allowance** **2**	**Family allowance** (if applicable) **3**	**Long-term leave allowance** (if applicable)	**Special needs allowance** (if applicable)	**Research, training and networking contribution** **4**	**Management and indirect contribution** **5**
	EUR 4010	EUR 710	EUR 660	EUR 4720 x % covered by the beneficiary	requested unit[133] x (1/number of months)	EUR 1600	EUR 1200

* *A country correction coefficient applies to the living allowance in order to ensure equal treatment and purchasing power parity for all researchers. This coefficient is the one applicable to the country of the recruiting beneficiary*

mobility allowance. This allowance covers their additional, private mobility-related costs (e.g. travel and accommodation costs), not their

Costs Category 1,2,3

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	EUR 4010	EUR 710	EUR 660	EUR 4720 x % covered by the beneficiary	requested unit[133] x (1/number of months)	EUR 1600	EUR 1200

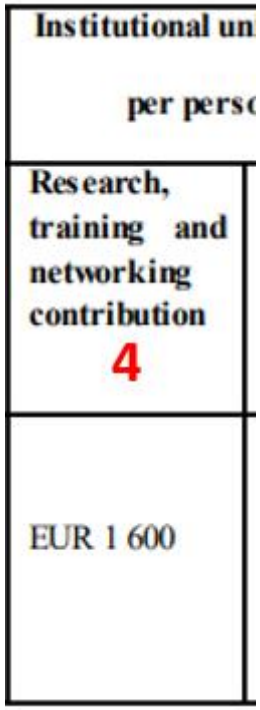
1. The living allowance is the minimum gross amount, including compulsory deductions under national law, such as employer and employee social security contributions and direct taxes.

2. The mobility allowance covers their additional private mobility related costs (not the professional costs → RTN)

3. The ESR will be entitled to the family allowance if he/she has or acquires family obligations during the action duration

CERN department will have to contribute in order to cover the costs of the ESR because CERN stipends are higher than the EU contribution received for each ESR

Costs Category 4

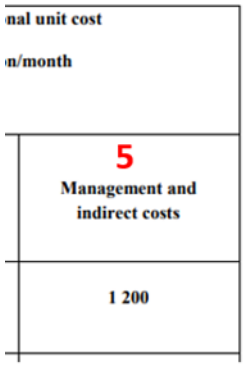


Institutional un per pers
Research, training and networking contribution **4**
EUR 1 600

This category should cover

- The travels of the ESR and their supervisors
- The training of the ESR
- The secondments
- The network wide events if the consortium agrees to give to the coordinator a portion of the RTN budget

Costs Category 5



nal unit cost / n/month	
5 Management and indirect costs	
1 200	

This category is usually partially kept at the coordinator level to cover

- The travels of the management team
- The administrative and financial support
- The organisation of the KO, mid term review
- The final event
- The communication and dissemination
- Keynote speakers …..

Internal Procedure at CERN : 50% considered as Management + 50 % as Overheads

- Management share can be used for the project
- Overheads share : internal procedure : 30% kept by the department, 70% centrally

For any financial question :
external.grants@cern.ch

More general information

Expected Outcome

- Expected outcome for students
  - **New research and transferable skills and competences**, leading to improved employability and **career prospects within and outside academia**;
  - New **knowledge** allowing the **conversion of ideas into products and services**, where relevant;
  - **Enhanced networking and communication** capacities with scientific peers, as well as with the general public that will increase and broaden the research and innovation impact.
- Expected outcome for participants
  - **Improved** quality, relevance and sustainability of **doctoral training programmes** and supervision arrangements;
  - **Enhanced cooperation and transfer of knowledge** between sectors and disciplines;
  - Increased integration of **training and research activities between participating organisations**;
  - Boosted **R&I capacity**;
  - Increased **internationalisation** and attractiveness;

Doctoral networks

- Objective: implement **doctoral programmes by partnerships of organisations from different sectors** across Europe and beyond to train highly skilled doctoral candidates, stimulate their **creativity**, enhance their **innovation capacities and boost their employability in the long-term**.
- Scope: implement doctoral programmes by partnerships of **universities, research institutions and research infrastructures, businesses incl. SMEs**.
- Selection procedure: open, transparent, merit-based, in line with code of conduct
- DN should develop **substantial training modules**, incl. digital ones, addressing key transferable skills and fostering the culture of open **science, innovation and entrepreneurship.**
- Particular attention is paid to **quality of supervision,** mentoring arrangements and career guidance.

Types of DN

- **Standard Doctorate**: at least three independent legal entities, each established in a different EU Member State or Horizon Europe Associated Country and with at least one of them established in an EU Member State. Max. 540 pm.
- **Industrial Doctorates:** They train PhD candidates who wish develop their skills and step outside academia, in particular in industry and business. Individual participants must be enrolled in a doctoral programme and **jointly supervised by the academic and non-academic partners**. ESR must spend at least 50% of time outside academia. 540pm.
- **Joint Doctorates:** They provide a highly integrated type of international, inter-sectoral and interdisciplinary **collaboration in doctoral training leading to a joint doctoral degree** or multiple doctoral degrees awarded by the participating institutions. At least three independent legal entities must be entitled to award doctoral degrees. PhD candidates must be enrolled in a joint programme and be jointly supervised. 540 pm. Confirmed that CERN can be beneficiary to JD network with prior arrangement of a joint doctoral degree from two universities.

Build the consortium

- As coordinator you need to **choose the members of the consortium** ("Beneficiaries" and "Partner" organisations
- **What does the specific beneficiary bring to the network?**
  - is it a world leader in this technology?
  - Does it have unique infrastructure?
  - Is it renown for its excellent PhD?
  - Does it have special training opportunities?
- **What does the specific beneficiary expect from the network as return?**
  - will receive resources - how does it plan to use them ?
  - explore a new technology ?
  - startup a new R&D line or strength its position ?
  - interested in the international network ?