LUMI AS A NATIONAL RESOURCE

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SNIC

Swedish National Infrastructure for Computing SNIC

The *Swedish National Infrastructure for Computing* is a science enabling e-infrastructure for Swedish academic research.

SNIC supports research of the highest quality in all areas of science that have needs of large-scale computing and/or large-scale data storage/management of active data sets.

SNIC is a consortium consisting of the ten largest Swedish Universities, with funding from the Universities and the Swedish Research Council.

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Swedish National Infrastructure for Computing SNIC

SNIC provides resources for large scale computing, and large scale storage.

SNIC also provides advanced user support for an efficient use of the computing and storage resources.

The SNIC advanced user support will collaborate with the LUMI user support team (LUST) and with ENCCS to support Swedish researchers use of LUMI.

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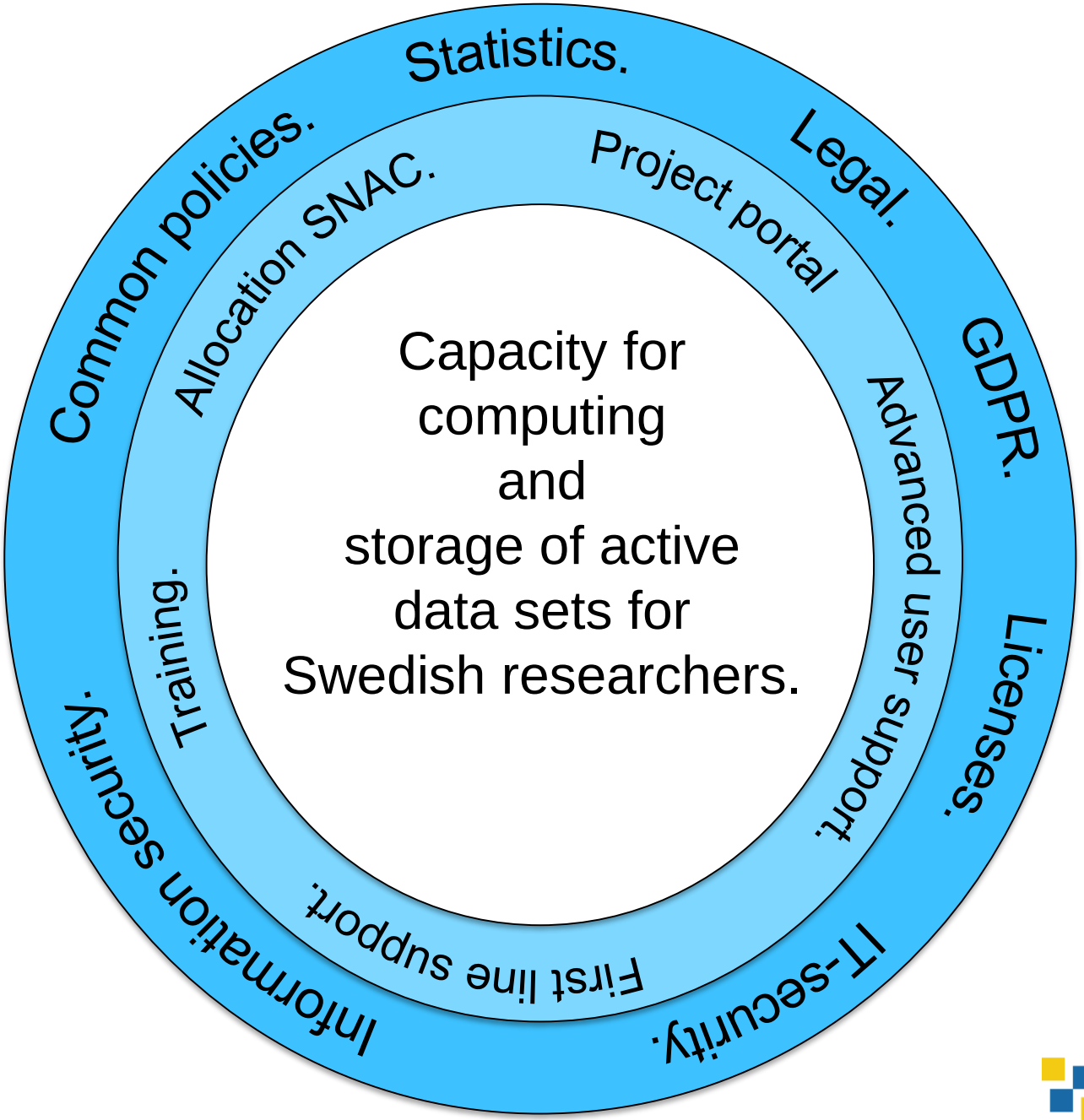
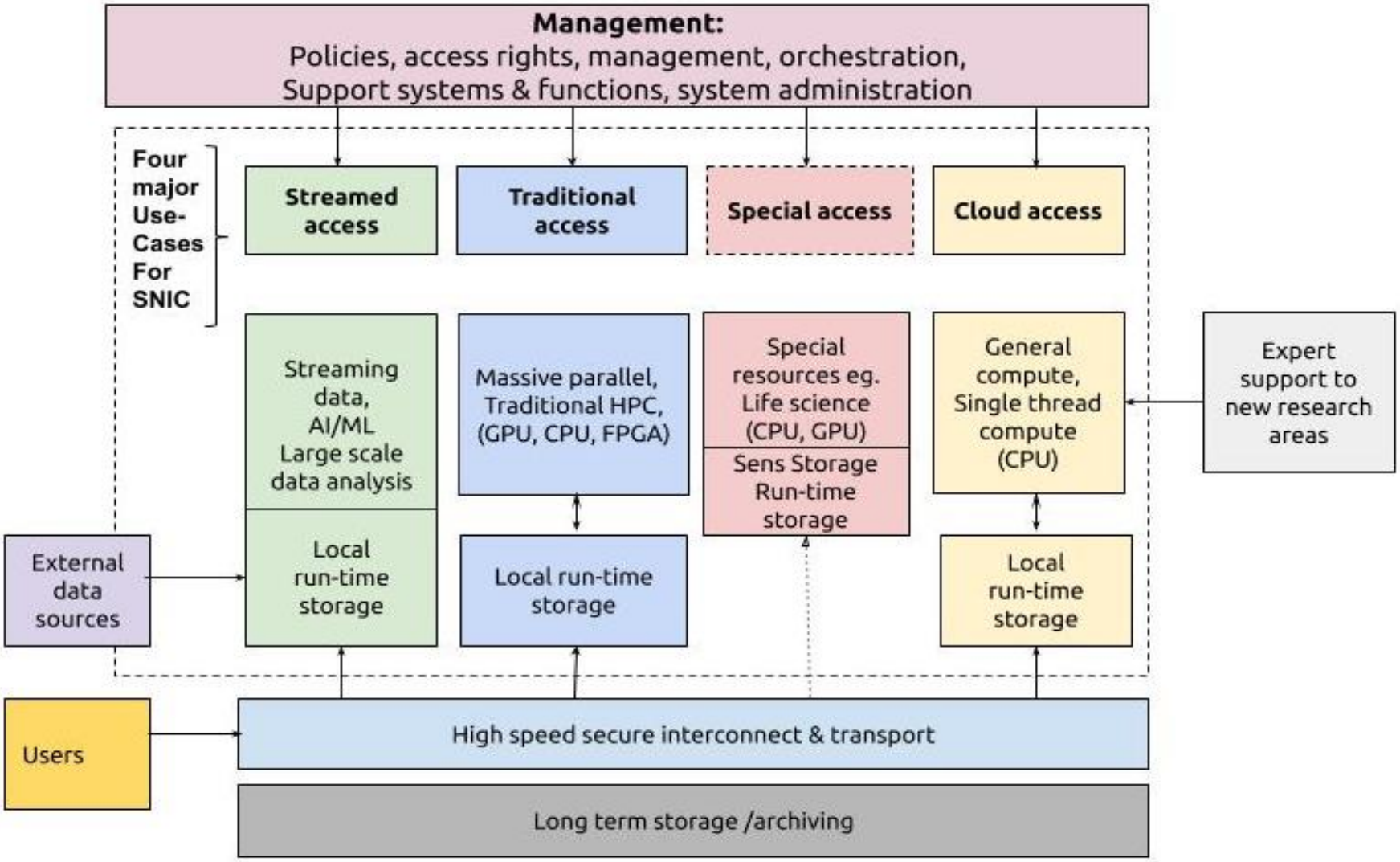
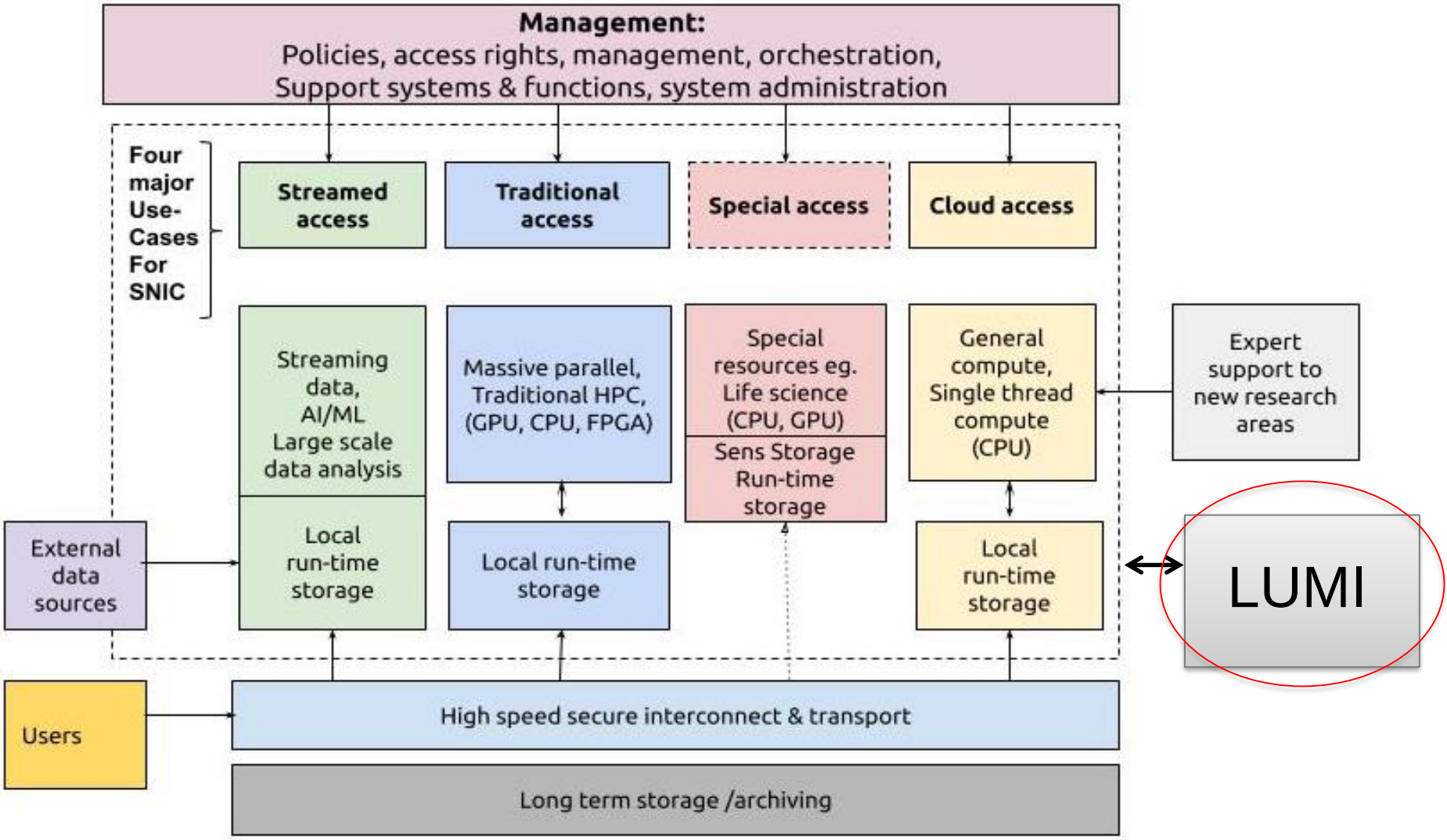

Statistics.
Legal.
GDPR.
Licenses.
IT-security.
Information security.
Common policies.
Allocation SNAC.
Project portal
Advanced user support.
First line support.
Training.
Capacity for computing and storage of active data sets for Swedish researchers.

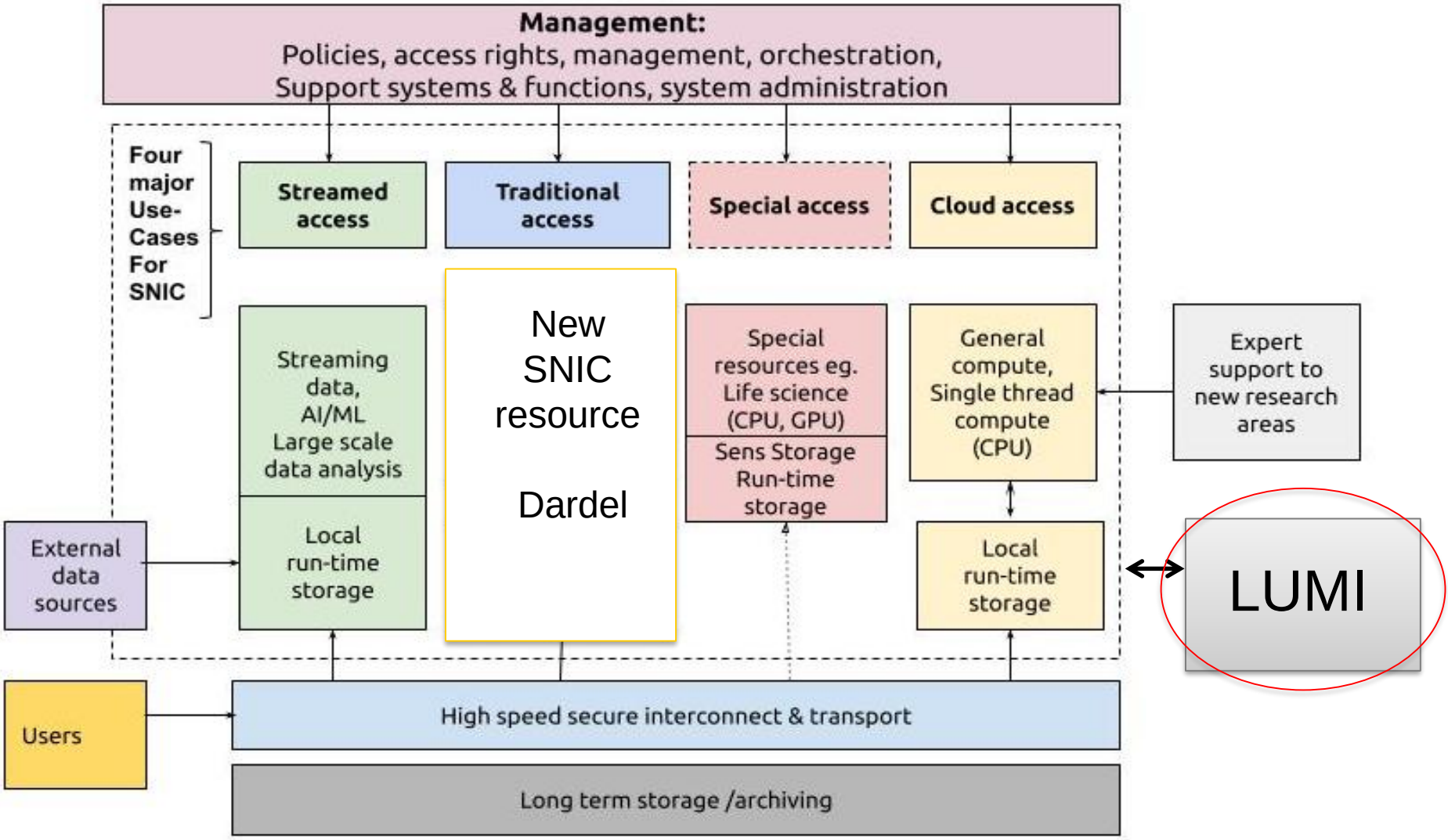
The SNIC computational resources



The SNIC computational resources



The SNIC computational resources



LUMI as a national resource

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LUMI as a national resource

Sweden participates in the LUMI collaboration via the Swedish Research Council (SRC). The dedicated Swedish part corresponds to 3.5 % of the LUMI resource.

SRC has asked SNIC to handle the projects for the Swedish part of LUMI: calls, reviews, allocation, statistics ...

LUMI as a national resource

- The SNIC computing and storage resources are allocated by SNAC and SNAC wg.
- SNAC will also allocate the Swedish part of LUMI.
- SNAC will be complemented by international reviewers to get an international input to Swedish research, and to avoid conflicts of interest.
- The assessments and opinions should help the researchers so that they will be able to compete for resources on e.g. the JU part of the EuroHPC resources.

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LUMI as a national resource

- The SUPR portal will be used for the application process.

- An interface is being developed in the Puhuri project so that LUMI can exchange information regarding e.g. allocations and user statistics, with the national allocation systems, e.g. SUPR.

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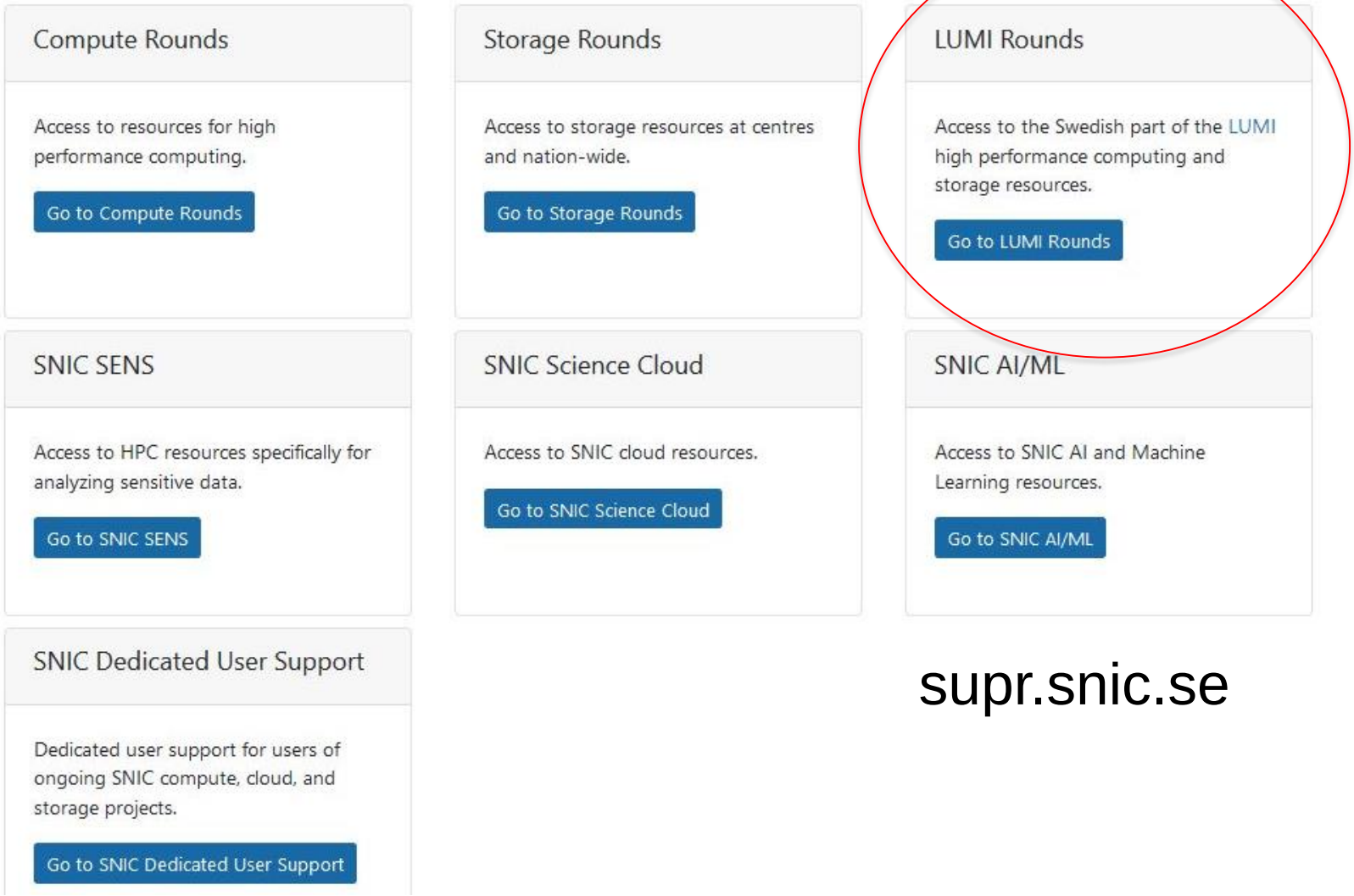
SUPR portal
proposals, applications, decisions, statistics



supr.snic.se

LUMI as a national resource

The allocations for the Swedish part of LUMI will mainly be divided in two kinds (similar to projects used for the JU part of LUMI).

- **General access** (Tier-1 Project Access)
- **Extreme scale** (Tier-0 Project Access)

- From the LUMI Resource Allocation Plan

The national Extreme Scale (Tier-0) projects are applied and granted basing on the same proposal templates as PRACE is using for distributing the EC share of the access. This is to foster the transferability of the projects between LUMI and the other EuroHPC systems and encourages researchers to apply also via the international allocation.

- The division of the national resources between *General access* and *Extreme scale access* projects is not decided yet.

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LUMI as a national resource

- The first call for *General access* projects is open until 2021-04-09.

  This call is only for the autumn 2021 and it will only concern the CPU-part of LUMI, corresponding to ca 7000 cores (ca 4 800 kch/month).
  We aim to use international reviewers in the allocation process.

- In the autumn 2021 the call will include both *General access* and *Extreme scale* projects.

  Details regarding the call will be finalized during the spring 2021.

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LUMI as a national resource

- There will be two pilot use periods for LUMI
  - Phase 1: data-intensive computing, high-throughput computing, and high-performance data analytics (CPU-only) workloads. August 2021
  - Phase 2: highly scalable GPU applications. December 2021 - January 2022

- For each phase there will be two pilot projects per country.
- The call for the pilot projects is closed.
- Decision about the pilot projects will be made by the SRC based on suggestion by SNAC.

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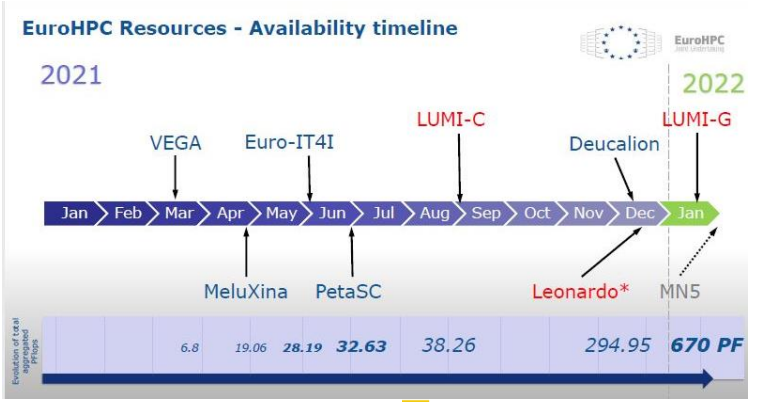
LUMI as a national resource

- **EuroHPC era**: Unprecedent amount of computational resources and capabilities available for European research & innovation.
- There will be capacity available at three pre-exascale and five petascale systems via EuroHPC JU, in addition to the Swedish part of LUMI.
- The systems will be complemented by competence building and user support activities.
- Use the competence available via LUST, ENCCS and SNIC!



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