

**ADVANCED COMPUTING RESOURCES  
AND HIGH-PERFORMANCE KNOWLEDGE  
FOR **HUMAN SURVIVAL** IN CRISIS TIMES**

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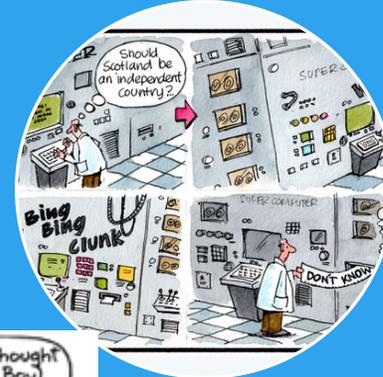
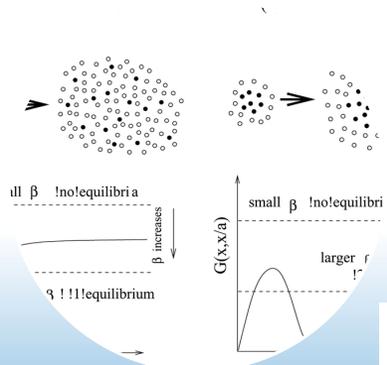
**(SCALAC GENERAL CHAIR)**

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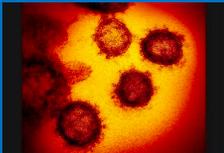
# SCIENCE AND ADVANCED TECHNOLOGY FOR ALL



Decision Takers

## Reality- Theory (Data and Models)

Experts- Scientists  
(Biologists, Doctors, Economists)

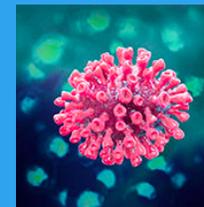


## Experiments - Data Storage- Simulations

Experts Scientists – Computer and Informatics  
Informatic, Math Applied



## Advanced Computing Platforms / Supercomputing



Citizens, All

Connectivity - Collaboration

Technology - Infrastructure



# ADVANCED COMPUTING FACE TO FACE REAL TIME NEEDS

**datanami** **ENTERPRISE AI** **HPC** **wire**  
DATA SCIENCE AI ADVANCED ANALYTICS ADVANCED COMPUTING IN THE AGE OF AI

**SPOTLIGHT ON**

**How the HPC and AI Communities Are Accelerating the Pathway to a Cure and Improving Life Around This Pandemic**

<https://tiny.cc/4wjylz> from @HPCWire Published  
25/03/2020

- **Detection and Monitoring**
  - Data from Tests (Positive and Negative)
  - Following Data (Monitoring and Forecast)
  - Social Issues (Economic Consequences, Anxiety, Violence, Safety, Security...)
- **Modelling, Simulation and Data Treatment**
  - Understand SARS-COVID19 (Molecular simulation, Docking, Folding, Sequencing and Alingment)
  - Pandemical Behaviours
  - Medical Treatment
- **Collaboration and (Scientific and Official) Diffusion**
  - Social Forecasting
  - Decision Takers Forecasting
  - Data Reproduction, scientific publication sharing, forums



# ADVANCED COMPUTING INITIATIVES COORDINATED BY SCALAC/REDCLARA

SDUMONT2020-CHAMADA1 (SDUMONT2020-CHAMADA1)

This is the JEMS - Journal and Event Management System. To submit papers or reviews, you must have an account with JEMS. If you already have an account but don't remember your password, fill in the user ID field (with last name, JEMS ID# or email address) but leave the password field blank, and JEMS will email your password to your registered email address. Your JEMS ID# and password will stay the same for all the conferences you participate in or submit a paper to. Do not create a new account if your personal information (email address, affiliation, etc.) has changed; instead, update the information by editing your profile. If you are not sure about your JEMS login name, try your last name to see if JEMS knows you already. Your browser must have cookies enabled.

**JEMS login**

Last name, JEMS ID# or email address:

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JEMS (Journal and Event Management System) is an adapted version of the EDAS system by Henning Schulzrinne. You can access the original Schulzrinne EDAS version/installation at <http://edas.info>. The current JEMS version is different from the original EDAS: it has been adapted to the local customs and conditions. This version/installation of JEMS is maintained by the Computer Networks Group (CNG) of the Federal University of Rio Grande do Sul (UFGRS) and provided as a service to organizers of conferences.

On some of the pages you will find links to the people that run JEMS:

- JEMS maintainer** - is responsible for the maintenance of and improvement to the system. He is also responsible for fixing the bugs. If you find points in JEMS with some strange behavior or error, please contact the JEMS maintainer. The maintainer is NOT responsible for uploading your papers or for solving problems specific to your conference.
- Conference chair** - is the person that runs a particular conference hosted by JEMS. The conference chair is responsible for setting up the program committee, for determining the conference deadlines and topics, for coordinating the rebuttal process (when used), for coordinating the review process of the submitted papers, and for coordinating the process of selecting the papers to be published by a conference. If you have questions about these matters, contact the conference chair.
- Conference administrator** - helps the conference chair to handle the technical JEMS-related matters of the conference. Simple questions (regarding paper registration, paper uploading, etc.) can be sent directly to the conference administrator. If need be, the conference administrator will forward your question to the conference chair, to the JEMS administrator, or to the JEMS maintainer.

## • Access to HPC/Advanced Computing Platforms

1. LNCC Brazil:

<https://jems.sbc.org.br/Paper.cgi?c=3557&track=8039>

2. NLHPC Chile : <https://covid19.nlhpc.cl/>

3. SC3UIS Colombia: <https://www.sc3.uis.edu.co/scalac-covid-19/>

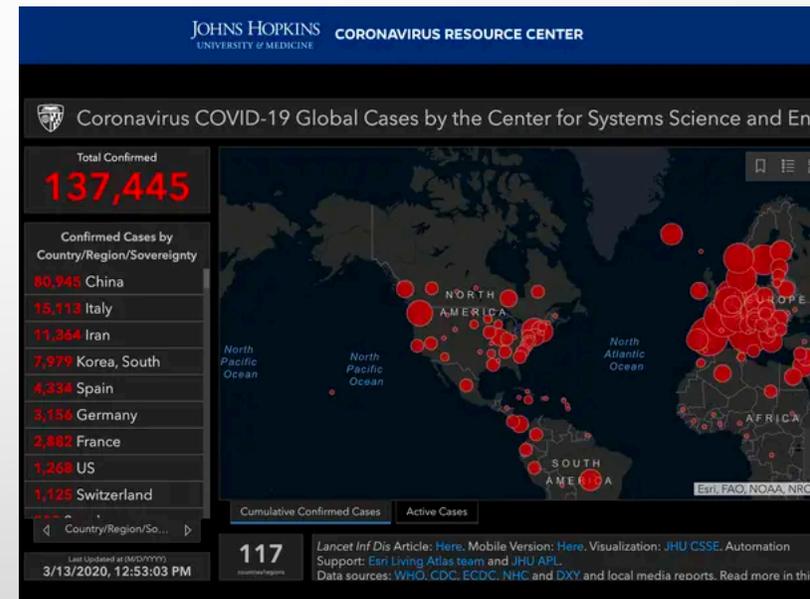
However all access is possible via RedCLARA portal.



# AND IN YOUR HOUSE?

- **Citizen Science Support for Research**
  1. Compute Time via @Home Applications
  2. Tracking and Data Analysis
  3. Depurate Information

## 4. #StayAtHome



<https://foldingathome.org/covid19/>

# LATIN AMERICA AND THE CARIBE

## SOME INTERESTING NUMBERS

- 33 INDEPENDENT COUNTRIES
- 15 DEPENDENCY TERRITORIES
  - 3 FRENCH DEPARTMENTS
  - 5 SPECIAL UK ZONES
  - 4 SPECIAL NETHERLAND DEPARTMENTS
  - 2 USA PROTECTION ZONES (PUERTO RICO IS ONE OF THEM)
- 20 COUNTRIES SPEAK SPANISH MAINLY
  - + ALL SOUTH STATES OF USA + PUERTO RICO
- 1 INDEPENDENT COUNTRY SPEAKS MAINLY PORTUGUESE
  - HOWEVER WE CAN UNDERSTAND US IN PORTOÑOL
- 13 INDEPENDENT COUNTRIES SPEAK ENGLISH MAINLY
- 1 INDEPENDENT COUNTRY SPEAK DUTCH.
- 1 COUNTRY SPEAKS MAINLY FRENCH (HAITI).
- ... AND MORE OF 100 PRE-COLUMBIAN LANGUAGES.



# SCALAC



- ADVANCED COMPUTING SYSTEM FOR LATAM AND CARIBBEAN
  - PROMOTE COLLABORATION
  - SHARE RESOURCES
  - ONLY FOR NON-PROFIT AND CONTINENTAL/HUMANITY NEEDS IN RESEARCH AND DEVELOPMENT
- LEGAL SOCIETY IN COSTA RICA (AS INTERNATIONAL NON-PROFIT SOCIETY)
- FIRST INTENTION SIGNATURE IN MARCH 1 2013

- HPC INFRASTRUCTURE SHARING

- ARGENTINA\*
- BRAZIL
- COLOMBIA
- CHILE
- MEXICO

- DEPLOYMENT DEVELOPMENT OF APPLICATIONS AND CUSTOMIZATION

- ARGENTINA
- COSTA RICA
- COLOMBIA
- MEXICO
- BRAZIL
- URUGUAY
- CHILE
- VENEZUELA



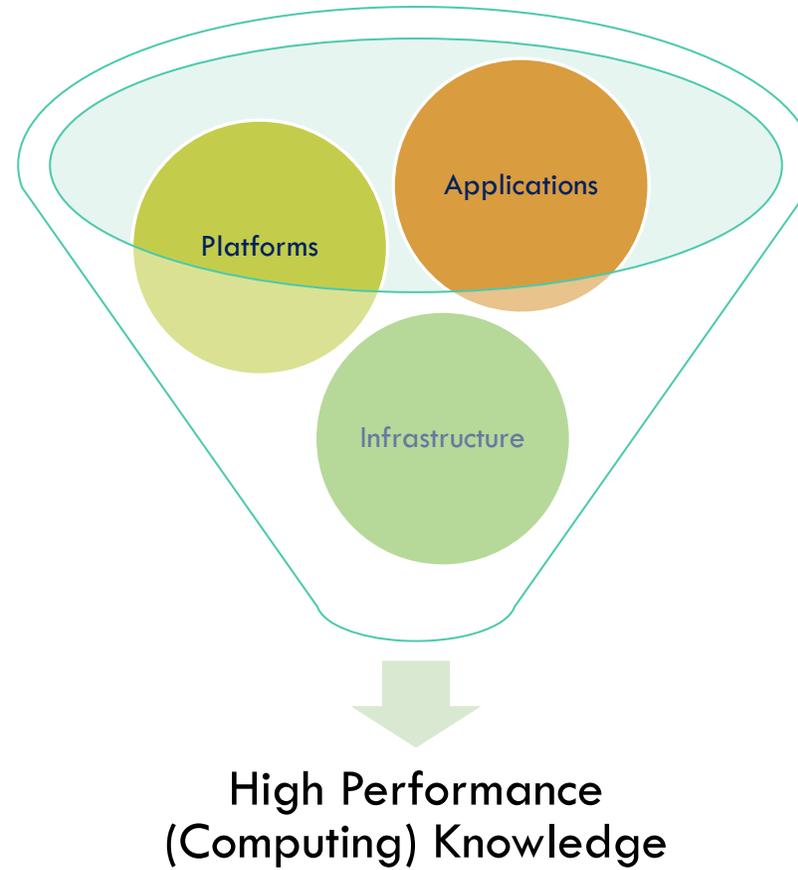
- SCIENTIFIC APPLICATIONS OUTREACH

- ARGENTINA
- BRAZIL
- CHILE
- URUGUAY
- COSTA RICA
- PERU
- TRINIDAD AND TOBAGO
- COLOMBIA
- VENEZUELA
- MEXICO

- EUROPEAN PARTNERS

- BSC-CNS (SPAIN)
- CIEMAT (SPAIN)
- INRIA (FRANCE)
- LIG (FRANCE)
- I3S (FRANCE)
- DEMOCRITOS (ITALY)
- UNILUX (LUXEMBOURG)
- #RICAP (CYTED ACTION)

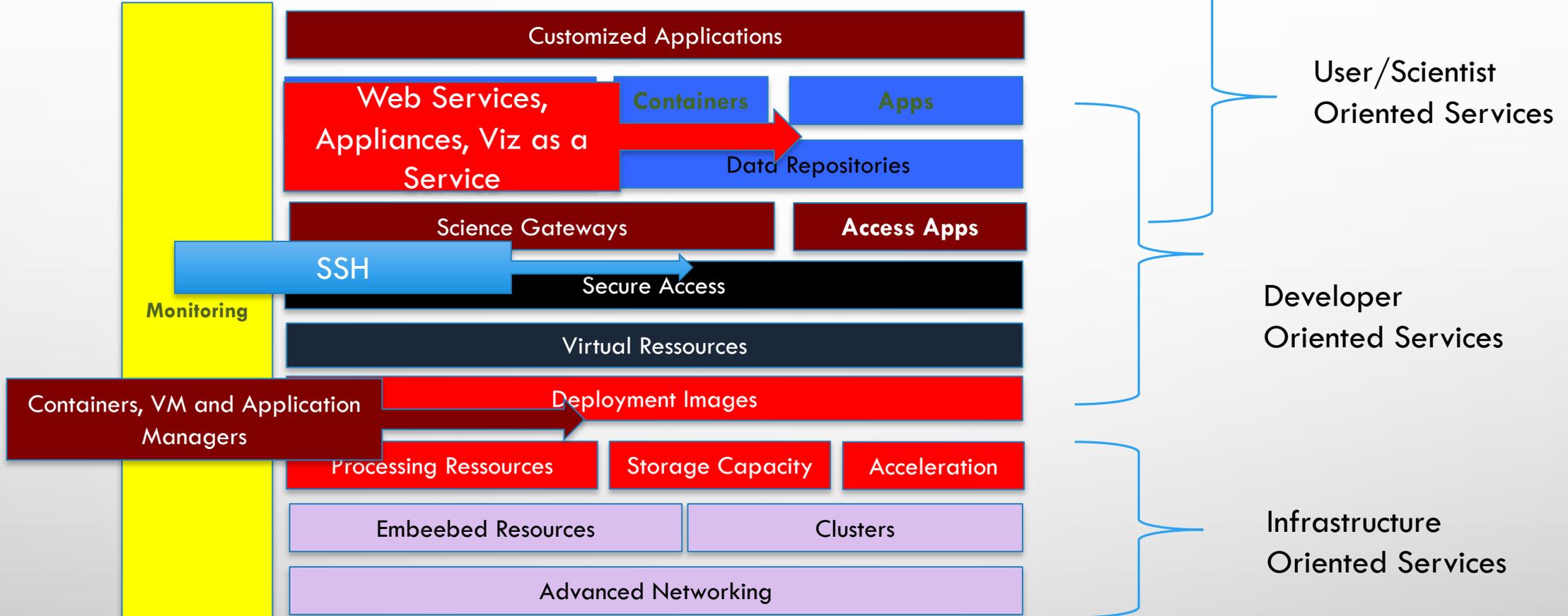
# Big Problems, Smart Solutions





# HPC as A Service Model

\* Red Components are (most) concerned at Viz As A Service



Super Computación y Cálculo Científico UIS



# MORE INFORMATION

- <https://www.scalac.net>
- follow us in twitter:  
[@SCALAC\\_Computo](https://twitter.com/SCALAC_Computo)

**#StayAtHome**

