

LSPM

LABORATORY OF SCIENCES OF PROCESSES AND MATERIALS

LSPM IS A CNRS RESEARCH UNIT (UPR3407) LOCATED ON THE CAMPUS OF UNIVERSITY PARIS 13. IT RESULTED FROM THE MERGING OF 2 PREVIOUS RESEARCH UNITS IN 2011, NAMELY LIMHP AND LPMTM.

LSPM IN

A FEW FIGURES :

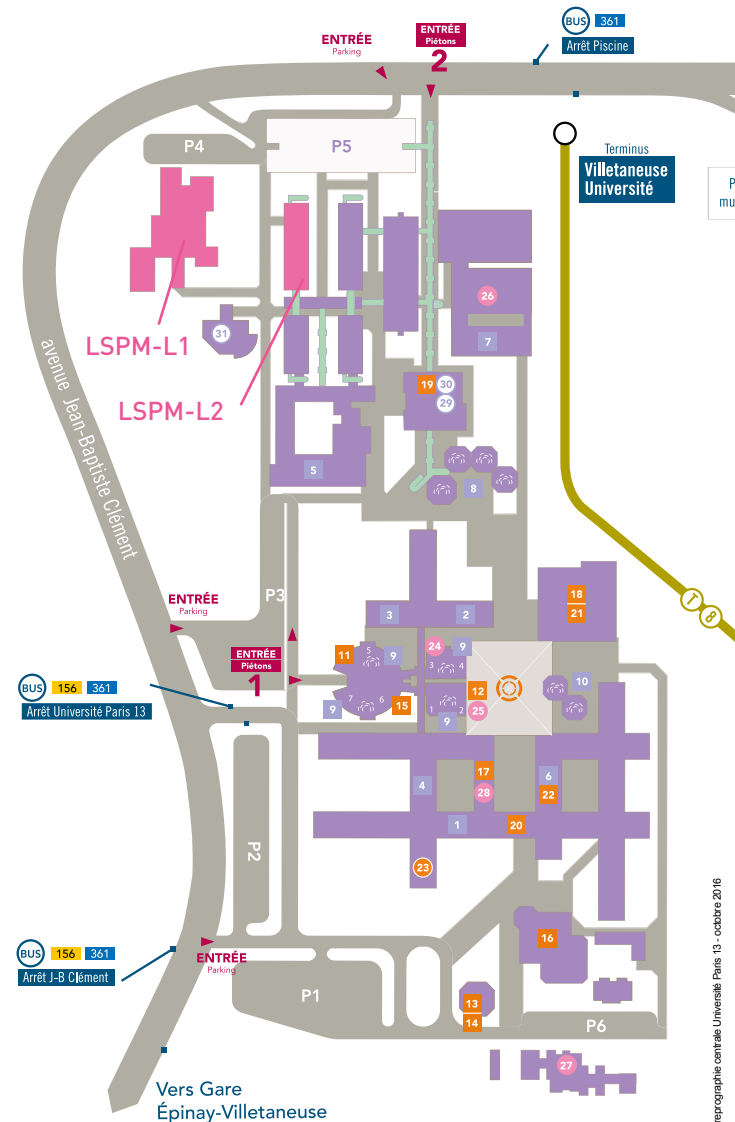
About **130** people including
70 permanent researchers
130 papers published per year
More than **30** academic
research projects
and **20** direct
industrial contracts
Over the last **4** years

LE LSPM IN A FEW WORDS :

- Developing new processes for material synthesis
- Modelling and characterizing material's behaviour
- Integrating new materials and processes in systems and devices

Local train (ligne H) from Gare du Nord (Epinay-Villetaneuse station) + bus 156 or 361 or Tramway T8 from Saint-Denis ; By car enter parking P3

VILLETANEUSE CAMPUS



ACCESS

Local train (ligne H) from Gare du Nord (Epinay-Villetaneuse station) + bus 156 or 361 or Tramway T8 from Saint-Denis ; By car enter parking P3

CONTACT

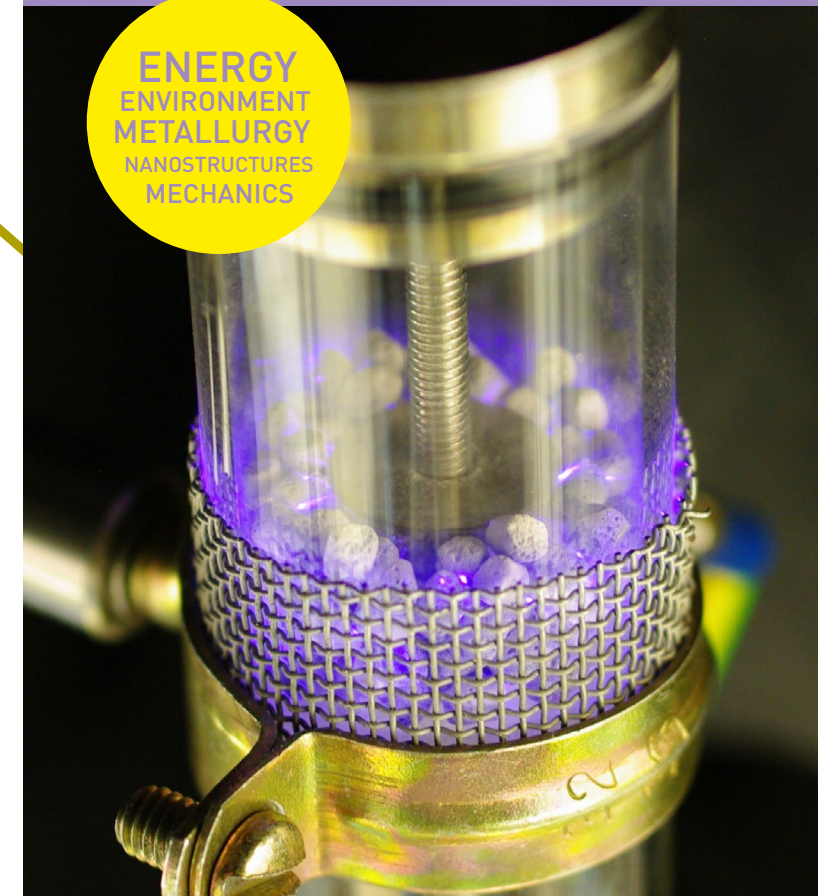
LSPM-CNRS - Bâtiments L1 et L2
99 avenue JB Clément - 93430 Villetaneuse
Tél. : 01 49 40 34 37 - direction@lspm.cnrs.fr



LSPM

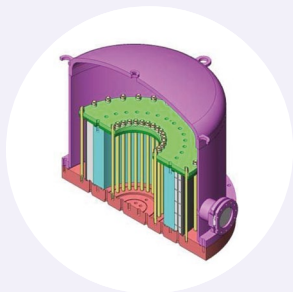
LABORATORY OF SCIENCES OF PROCESSES AND MATERIALS

ENERGY
ENVIRONMENT
METALLURGY
NANOSTRUCTURES
MECHANICS

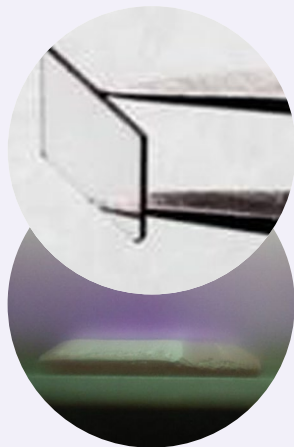


PROCESSES AND MATERIALS FOR ENERGY AND ENVIRONMENT

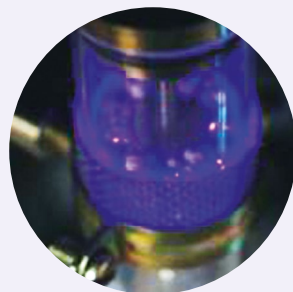
DEVELOPING
ENERGETICALLY
EFFICIENT,
CLEAN PROCESSES :
SUSTAINABLE
DEVELOPMENT



Storing and transporting
hydrogen under pressure



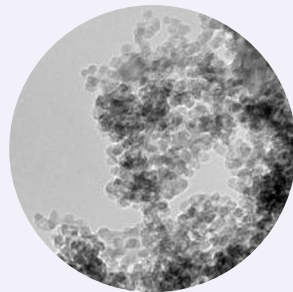
Diamond single crystals
for power electronics



Reactors plasma /
catalysis for waste
treatment



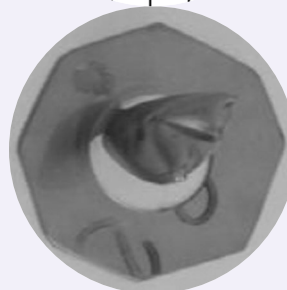
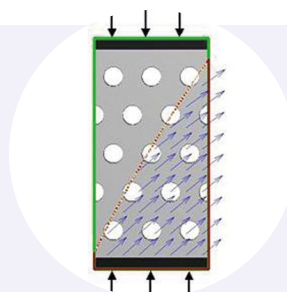
ZnO thin films by plasma
for photovoltaics



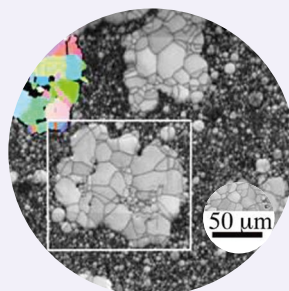
Oxide nano-powders
by sol-gel techniques;
biodiesel synthesis,
renewable energies

MATERIALS MECHANICS AND METALLURGICAL PROCESSES

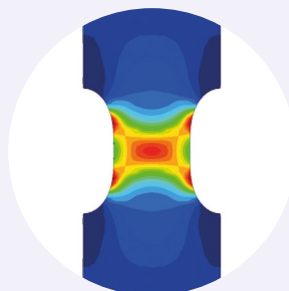
STUDYING
AND IMPROVING
MECHANICAL
PROPERTIES OF
STRUCTURAL
MATERIALS



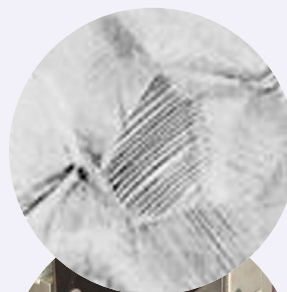
Study of damaging
and breakdown



Metallic matrix
nano-composites



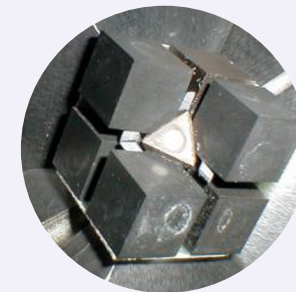
Modelling plastic
deformation fields



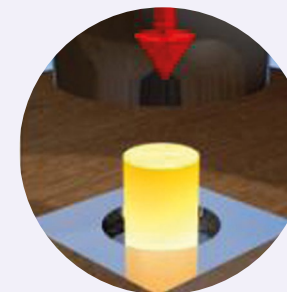
Thermomechanical
treatments: effect on
microstructure

PROCESSES UNDER EXTREME CONDITIONS

SYNTHESIZING
NEW MATERIALS
WITH NON-
CONVENTIONAL
PROPERTIES



New high pressure high
temperature phases



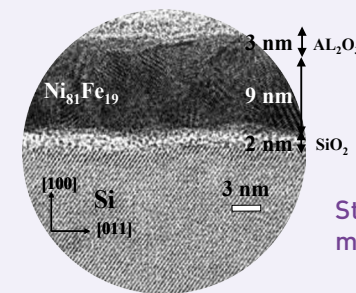
Combustion synthesis

THIN FILM MAGNETIC NANO-STRUCTURES

STUDYING
MATERIALS
FOR ELECTRONIC
AND
TELECOMMUNICATION
APPLICATIONS



Brillouin spectroscopy:
elastic and magnetic
properties



Stacking of thin
magnetic films