

Le Groupe des Écoles Nationales d'Économie et Statistique GENES

(directorate of higher learning and
research of INSEE)

Web sites

- ENSAE:<http://www.ensae.fr>
 - ENSAI:<http://www.ensai.org>
 - CREST:<http://www.crest.fr>
 - CEPE:<http://www.lecepe.fr>
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Mission of higher learning and research of INSEE

- ❑ The french national statistical institute has a general mission of teaching and research in the fields of statistics, economics and sociology.
 - ❑ This general mission goes beyond the field of official statistics.
 - ❑ The learning mission of INSEE dates from its creation in 1946
 - ❑ The first research department at INSEE dates from 1969.
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Four education and research units

- Two « grandes écoles »:
ENSAE, ENSAI
 - One center of continuous training: le CEPE
 - One research center: le CREST
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The « Grandes écoles »

- Initial training of the administrateurs and attachés of INSEE. The senior staff of the french statistical institute
 - Initial training of students for private and public sectors.
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The student categories

☐ ENSAE

☐ 15 to 20 civil servants

☐ 110 to 120 students

☐ of whom 10 to 15 foreign students

☐ ENSAI

☐ 40 to 60 civil servants

☐ 60 to 80 students

☐ of whom 5 to 10 foreign students

The recruitments of official statisticians (civil servants)

- ❑ Through an external competitive examination
 - ❑ Through an internal competitive examination
 - ❑ Through graduation from « École polytechnique » or « École normale supérieure »
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The recruitments of students

- ❑ Through a competitive examination after a post-secondary school preparatory programme mainly devoted to mathematics.
 - ❑ Through a competitive examination proposed to students in economics, business, and social-sciences.
 - ❑ After graduations (french « maîtrise ») in economics and mathematics from universities
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Level of recruitment

- French « Baccalauréat » + two years post-secondary school programme for competitive examinations
 - French « Baccalauréat » + four years post-secondary school programme in economics and/or mathematics at french or foreign universities or post-secondary school institutes
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Length and level of training in the schools of INSEE

- The syllabus last three years
 - The final level of the programme is equivalent to a first year of study for a North-American PhD or a top-level North-American Master's Degree in Economics or Statistics
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Jobs after ENSAE and ENSAI

- ❑ The official statisticians (administrateurs and attachés) will be enrolled in the french or international statistical system
 - ❑ The other students join banks or insurance companies (ENSAE mainly), economics services of large public or private firms (ENSAE, ENSAI), consulting groups (ENSAE, ENSAI), health and pharmaceutic companies (ENSAI mainly), industrial groups , and all companies involved in computing treatments and analysis of informations.
 - ❑ Some students choose to pass a PhD to become an academic
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The ENSAE syllabus

□ First year courses

Main initial training in mathematics

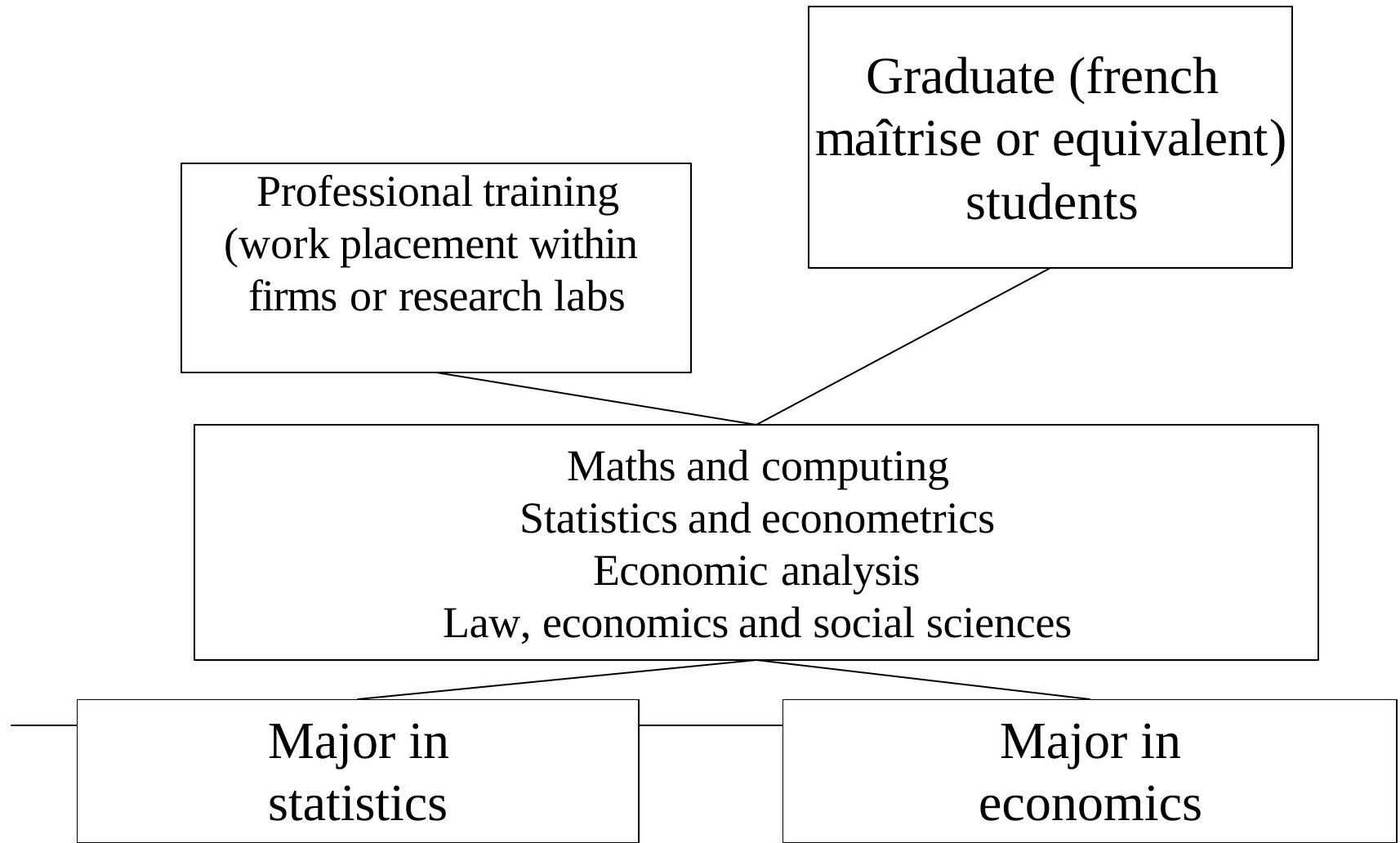
Main initial training in economics

Complements
maths and probas
Econ. History
Descriptive Econ.

Maths and Probas

Computing
Statistics
Economics

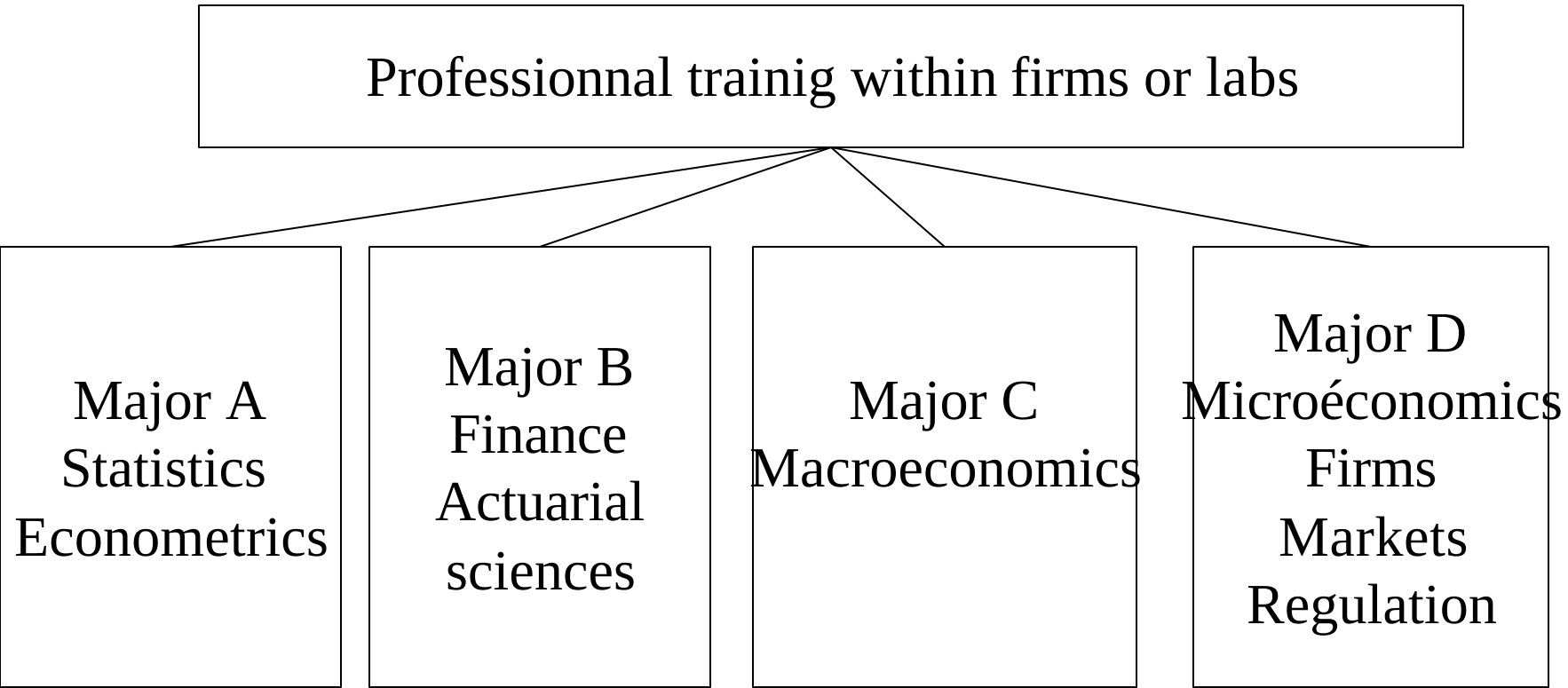
□ Second year courses



ENSAE

□ Third year courses

Professionnal trainig within firms or labs



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graph TD; A[Professionnal trainig within firms or labs] --> B[Major A<br/>Statistics<br/>Econometrics]; A --> C[Major B<br/>Finance<br/>Actuarial sciences]; A --> D[Major C<br/>Macroeconomics]; A --> E[Major D<br/>Microéconomics<br/>Firms<br/>Markets<br/>Regulation];
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Major A
Statistics
Econometrics

Major B
Finance
Actuarial
sciences

Major C
Macroeconomics

Major D
Microéconomics
Firms
Markets
Regulation

The ENSAI syllabus

- **First year courses**
 - Three programmes for the various origins:
 - 1) Mathematics
 - 2) Economics
 - 3) Internal recrutement and initial training in statistics
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ENSAI: first year courses

Main fields:

- Statistics, probability
 - Computing
 - Économics, management, social sciences
 - Communication
 - Foreign languages
 - Sport
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ENSAI: second year courses

- Main fields: as in the first year
 - Four majors:
 - P1: Economics
 - P2: Statistics
 - P3: Computing
 - P4: « Attachés » programme: the student involved in this major are future official statisticians. They will leave the ENSAI at the end of this second year programme (see further: « formation continue diplômante »)
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ENSAI: troisième année

□ Four specialised programmes:

- Economics , marketing, risks management
 - Sciences de la vie
 - Industrial applications
 - Computing treatment and analysis of informations
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□ Professional training: six months in a firm or a research laboratory

Continuous training of the « attachés de l'INSEE »

- If the civil servants at the Ensai quit at the end of the second year syllabus they are allowed to follow during the first seven years of their career as official statistician a continuous training equivalent to the third year courses of the ENSAI.
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Main fields of the « formation continue diplômante »

- ☐ Economic modelling
- ☐ Economics and Social sciences
- ☐ Survey methodology
- ☐ Statistical analysis
- ☐ Computing
- ☐ Professional environment

Remark: this training is governed by two logics: high level academic and professional.

Conclusion on the high level learning at INSEE

- The « grandes écoles » of INSEE offer high level trainings in statistics and economics for public statistical system and for the public and private, french or foreign corporations
 - This high level training system offers to the future official statisticians a common initial training open to various technics and questions which go beyond the pure official statistics and the proper needs of an economic administration.
 - This internal learning system offer a mean to work on top academic problems linked too genuine professional needs.
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Le CEPE

- ☐ Continuous training of the schools of INSEE
 - ☐ Dissemination of statistical, economical and sociological knowledges
 - ☐ Offer to the firms and administrations comprehensive presentations of the researches conducted by the GENES
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Methods

- 1) Core programme based on 3 to 5 days of courses:
 - 15 sessions in statistics
 - 9 sessions in économics
 - 1 session in sociology
 - 2) Specific sessions for firms or administrations
 - 3) Applications to offers to tender for training in statistics and economics (ex. Eurostat)
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Activity of the CEPE

- Total number of sessions: 65
 - Number of specific sessions: 25
 - Research seminar: 2
 - Number of participants: 600
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The CREST

- The CREST is the research center of the ENSAE, the ENSAI and the INSEE
 - The Crest is composed of nine research laboratories (seven in Paris and two in Rennes)
 - The CREST involves an associate team to the french national research center, le CNRS.
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Neuf laboratories

- ☐ Le département de la recherche
 - ☐ Le laboratoire de macroéconomie
 - ☐ Le laboratoire de microéconométrie
 - ☐ Le laboratoire d'économie industrielle
 - ☐ Le laboratoire de finance et assurance
 - ☐ Le laboratoire de sociologie quantitative
 - ☐ Le laboratoire de statistique
 - ☐ Le laboratoire de statistique et modélisation
 - ☐ Le laboratoire de statistique d'enquêtes
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Composition of the CREST

- 25 full time researchers:
 - Administrateurs de l'INSEE
 - Academics
 - Researchers from CNRS
 - 90 associated researchers (part time)
 - 40 PhD students:
 - 20 granted by CREST
 - 20 granted by other programmes
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Level of activity of the CREST

- Editing of the review: « Annales d'économie et statistique »
 - 9 on going seminars
 - 60 working papers/year
 - 140 publications/year
 - 10 thesis/year
 - 60 foreign visitors/year...
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Conclusion on the research part of INSEE

- ❑ Through the CREST the INSEE is largely open on the economics, sociology and statistical international research problems
- ❑ The CREST is a life observatory on the methodological developments
- ❑ The CREST can produce innovating treatments on social and economic questions in a pure scientific context.
- ❑ Support and development of knowledges for the professional of INSEE and the french statistical system.
- ❑ Transposition of the researches in initial and continuous training and correlatively for all official statisticians...

The GENES and the new French Law on higher education and research

- ❑ GENES member of two PRES: ParisTech and UEB
 - ❑ GENES associated with two RTRA: Paris School of Economics and GIS sciences for decisions
 - ❑ GENES member of the french Foundation of Risks
 - ❑ Project of a new building for the ENSAE and the CREST.
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