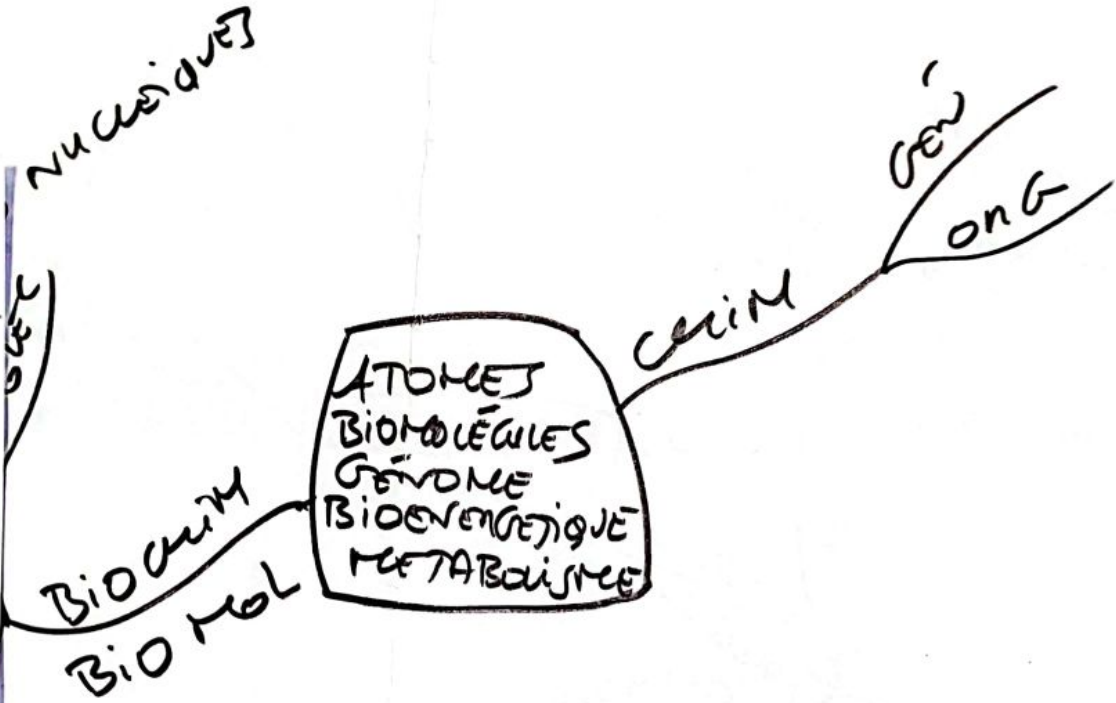


$$\begin{array}{r}
 64 \text{ pages} \\
 + 1 \\
 \hline
 = 65
 \end{array}$$

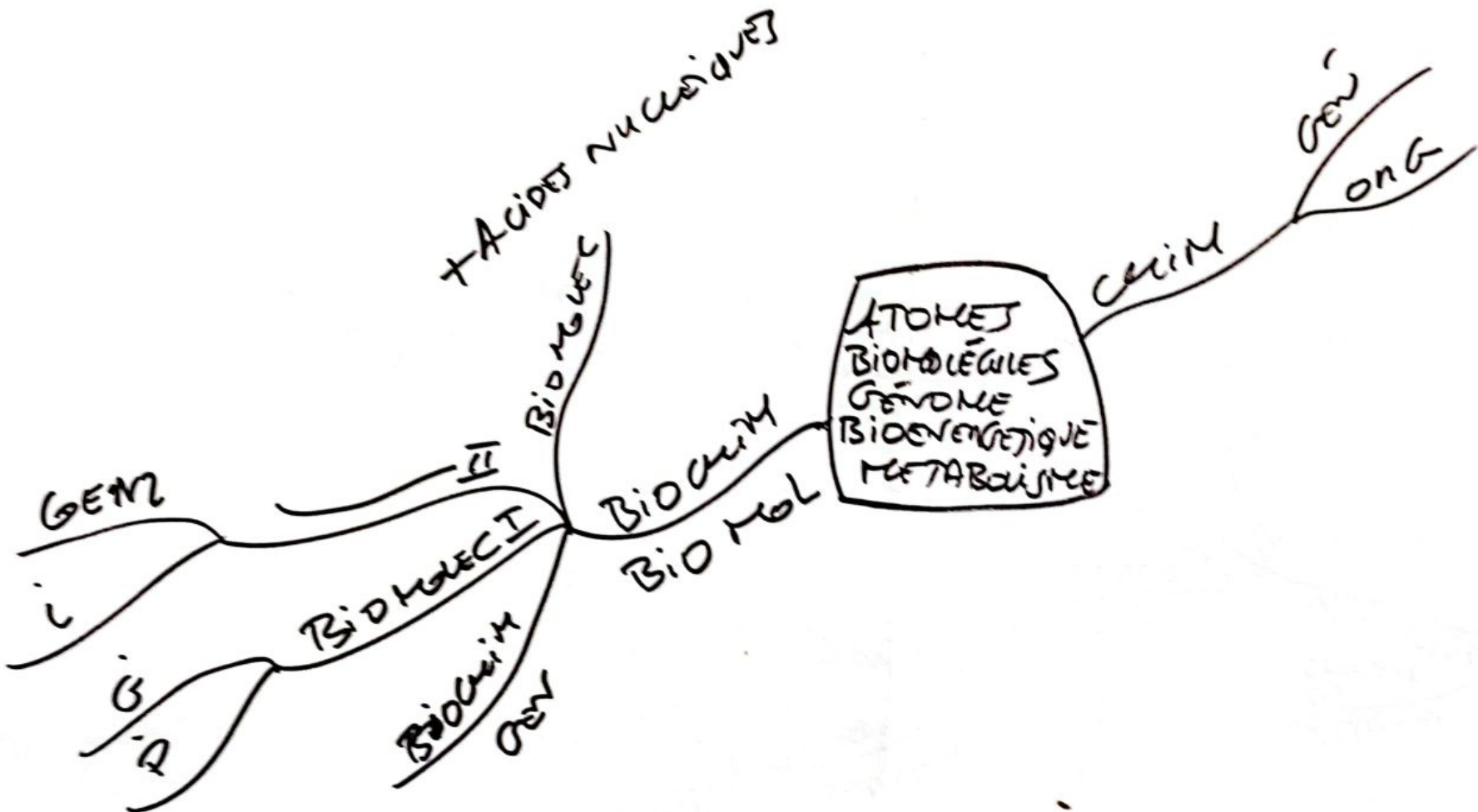


Somme de la taille
de :

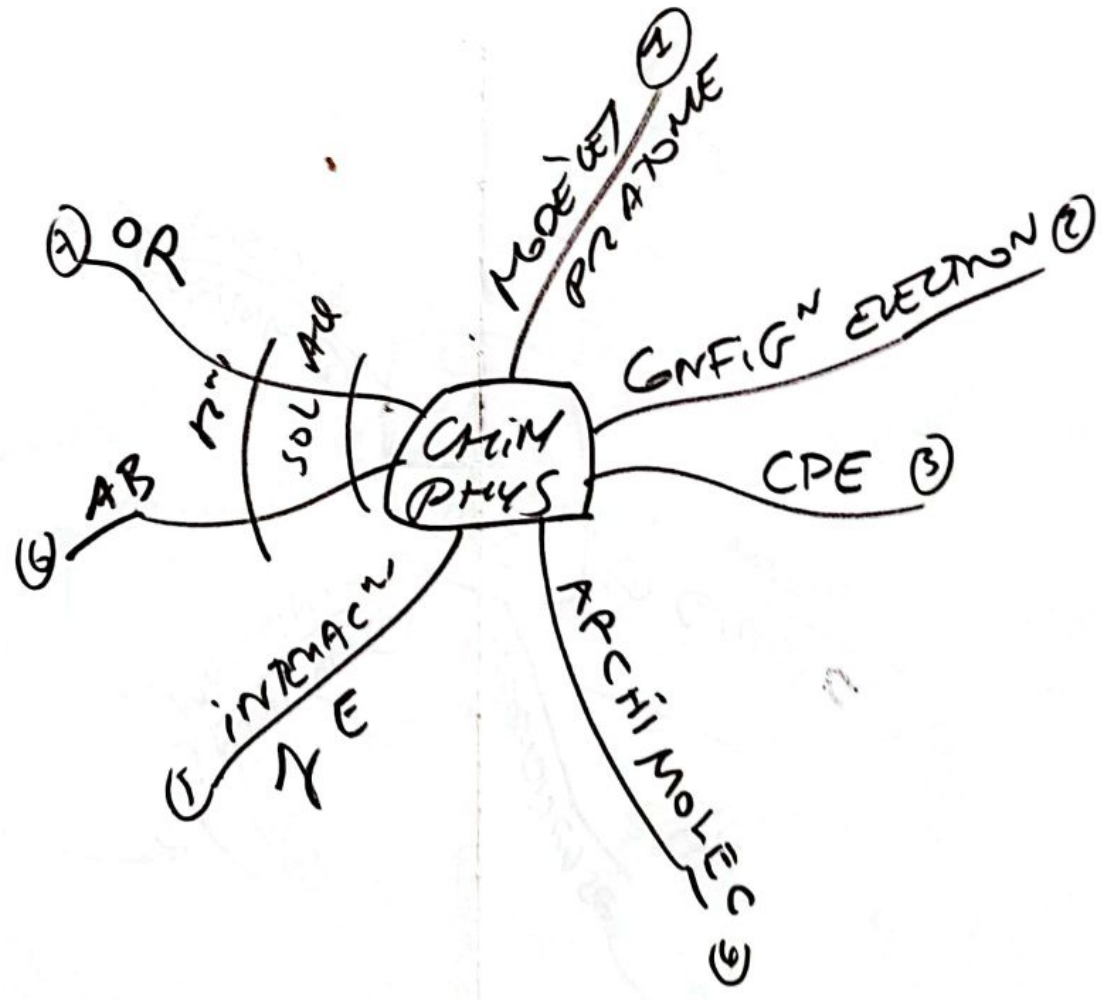
TOUSSAINT
CHIM/BIOCHIM/MOLÉC

~~BRANCHED~~

T
©



~~THE FINE & ART~~



~~GROUPS SOLVING~~

MODELES POUR ATOME

CONSTITUTION ATOME

HIS

- DACTON
- QUANTUM E
- Z QUANT
- IMPAIRS
- OBSERVATION DIRECTEMENT

STR ATOMIQUE MATIERE

ATOME

- P PART "EMI" $\frac{e}{m}$
- ELT CHIM $Z \times$
- ISOTOPES
- I⁺ ATOMIQUES $Z \times$

Avoir en tête la représentation des OA sur M

QUANTIQUE

- TYPE MA MN
- TRIPN
- CRE ISO RESISTE
- EX OA
- PROPRIETES
- OU OTT
- lim
- MOD SCHRÖDINGER
- QUANTITE
- QUANTIFICATION QUANT

NOMENCLATURE

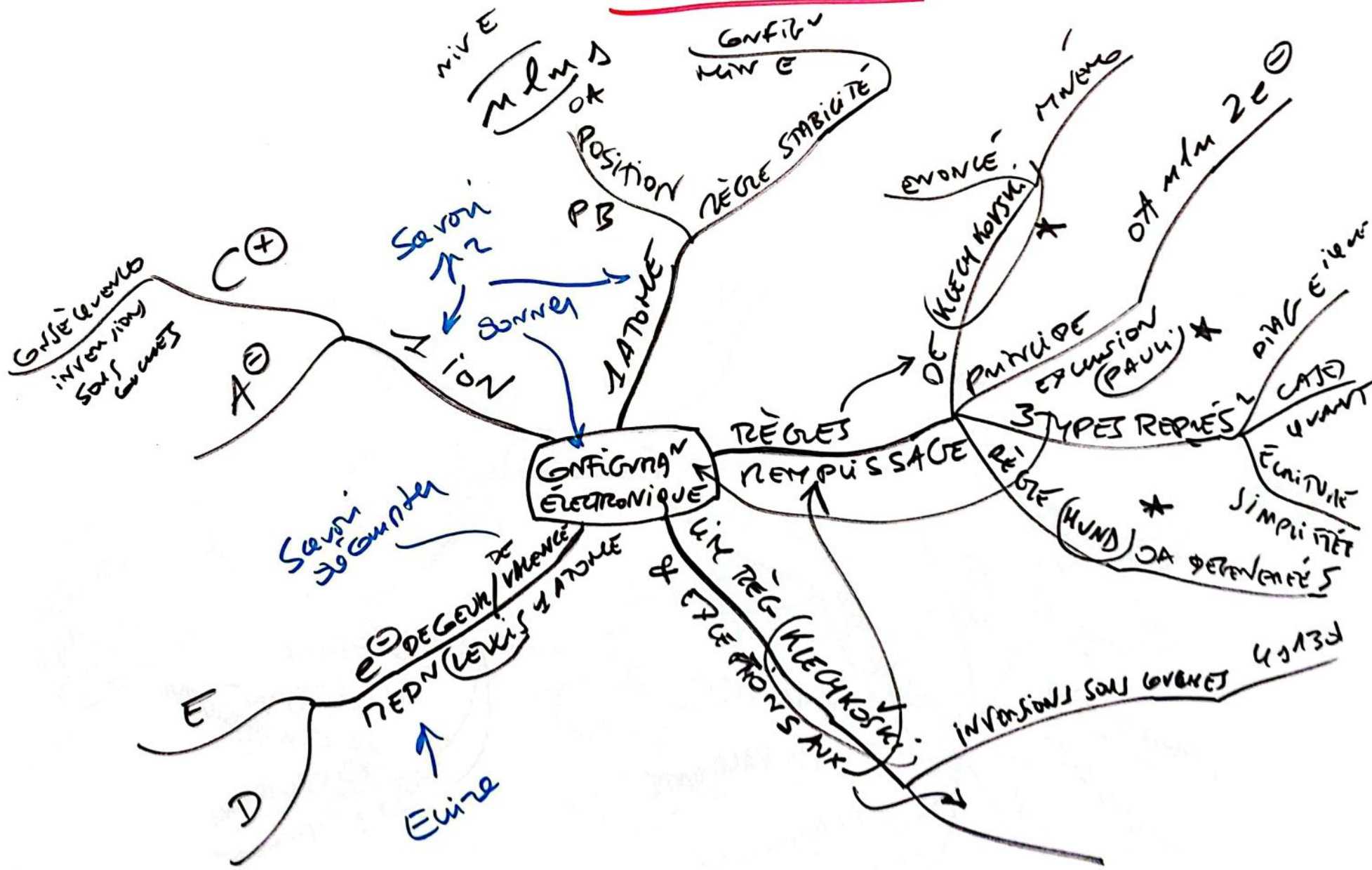
QUANTIFICATION ET MOD CORPUSCULAIRE

- INTRO + CONCEPTS
- COMPRENDRE
- MOD CORPUSCULAIRE (EINSTEIN)
- ECHANGES QUANTIFIES D'E
- SPECTRES
- EX
- TR



1 e⁻ est défini par son E & 1 OA, MATH à voir Probabilité de trouver e⁻ dans un volume de

TRÈS IMPORTANT



INTERACTIONS FAIBLE E

HYDROPHILIE
PHOBICITE

IONIQUE

PAIEMENTS
≠ ETAT
MANIERS
SOLUBILITE
DS & SOLVANT
POMME

EXCITATION ENVR 2 CHARGES
I[⊕] - DIPOLE

↕
= INTERACTION

Solubilité
Groupe H₂O
+ imp
Groupe ≠ T
Seroni disant sur ≠ T
27 etat entre ≠ groupe

LIASON H
↑
GYNAPME

INTRAMOLEC
E
GNS E

EX
DEF

AN
D
L

GYNAPME
STYDE

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DIP-DIP
↕
LIEE 2 CATION
↕
1 DIP INDUIT
↕
DIP INSTANTANE

"ORIGINE"
= KEESOM
"INDUCTION"
= DEBYE
"DISPERSION"
= LONDON

SOLUBILITE

T DE CHGT ETAT

EX
GNS E

INTERACTIONS
SUR
EXPRESSION
&
COMPARAISON

SOL AQ1: REACTIONS A-B

REACTIONS

- ESP IONIQUES
 POLAIRES: PLUTÔT SOLUBLES
 - APOL
 INGOL
 MISE EN SOL^N MISE SOL
 GMP ION
 H₂O
 SOLVANT
 HYDRATANT
 IONISANT
 DISSOLVANT
 DISPENSANT
 GMP MOLEC IONISABLE
 OU PARTIELLEMENT
 - NON IONISABLE

PRÉAMBULE

EVOLUTION
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 chim

AVANCEMENT
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 ETAT
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D BRUNSTEDT
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 66 OER
 1 PUIS 10

COUPLE A-B
 pH 1 SOL AQ

AUTOPROTOLYSE
 H₂O
 AMPHOTÈRE

CTE
 DIAG PRÉDOMINANCE

CTE BASICITÉ
 CTE ACIDITÉ

TITRAGES

F_{ij}
 PRÉVISIONS T_{ij}
 CTE → n A-B
 FONDS A & B
 CTE Aⁱ
 COUPLES
 CALCUL ON
 CASSERMENT
 COUPLES A-B

SOL TAMPONS
 IND GOURÉS

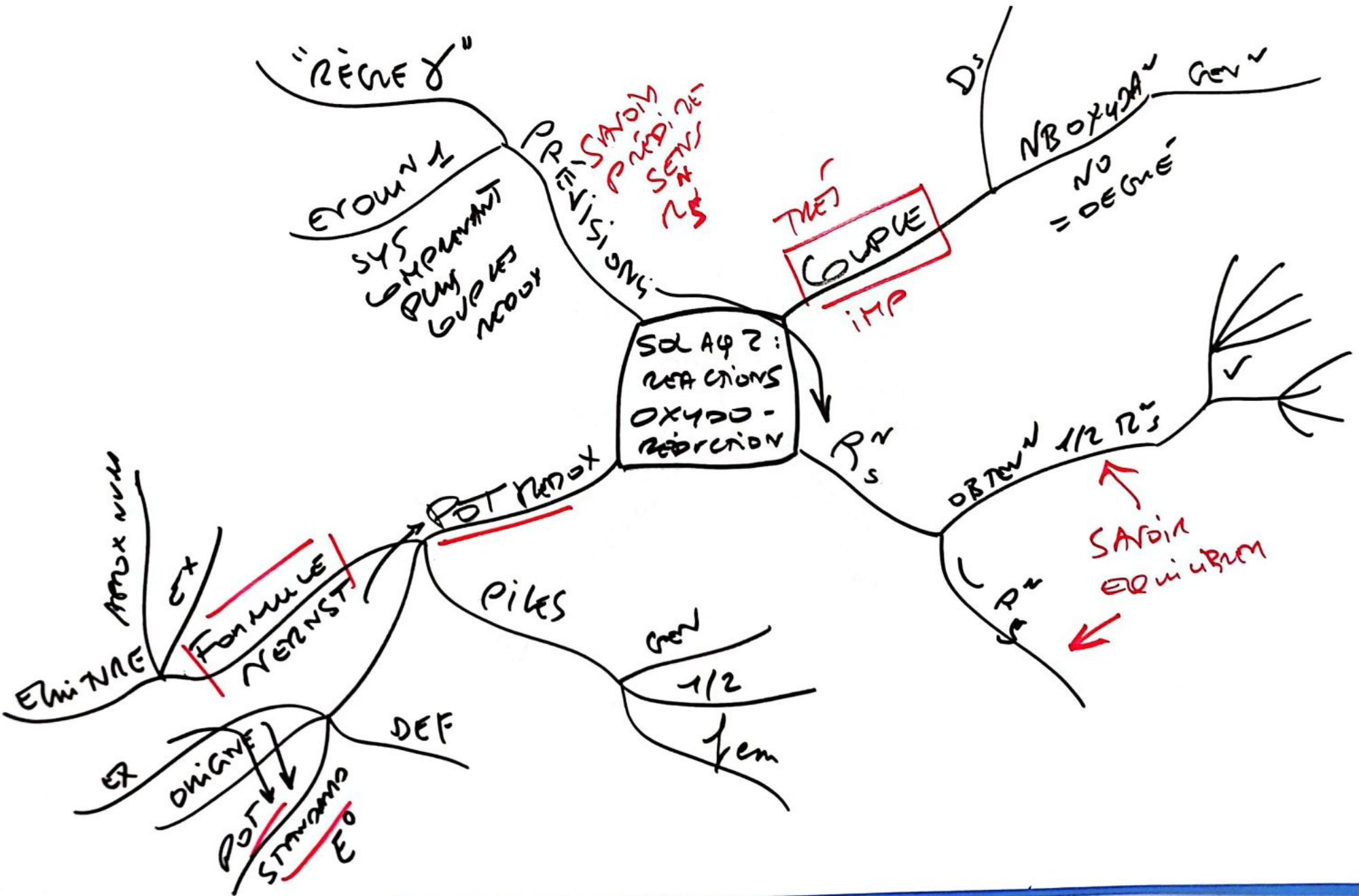
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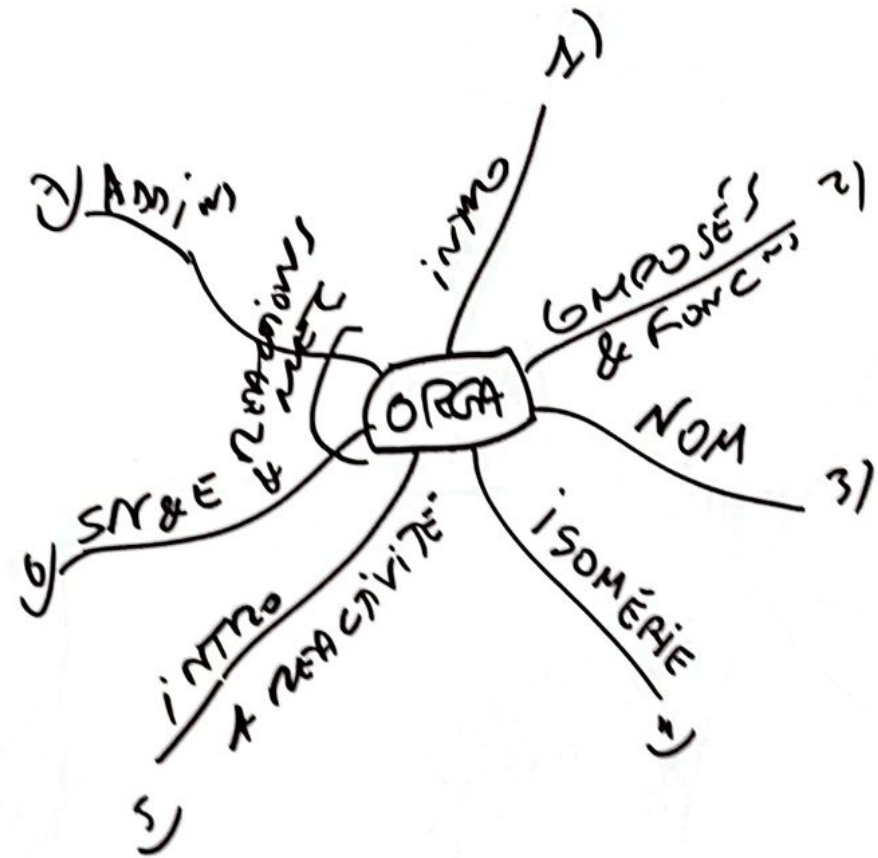
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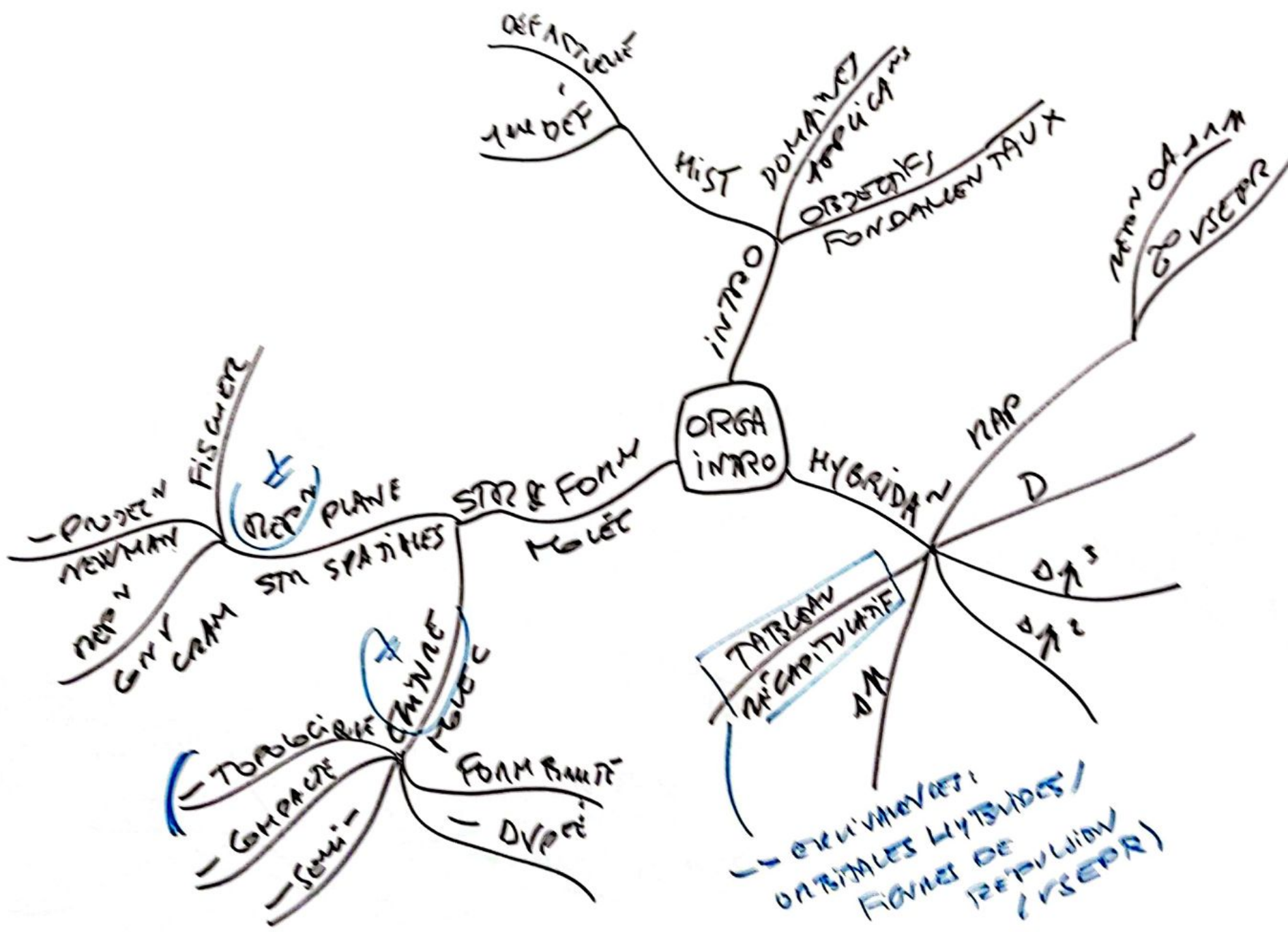
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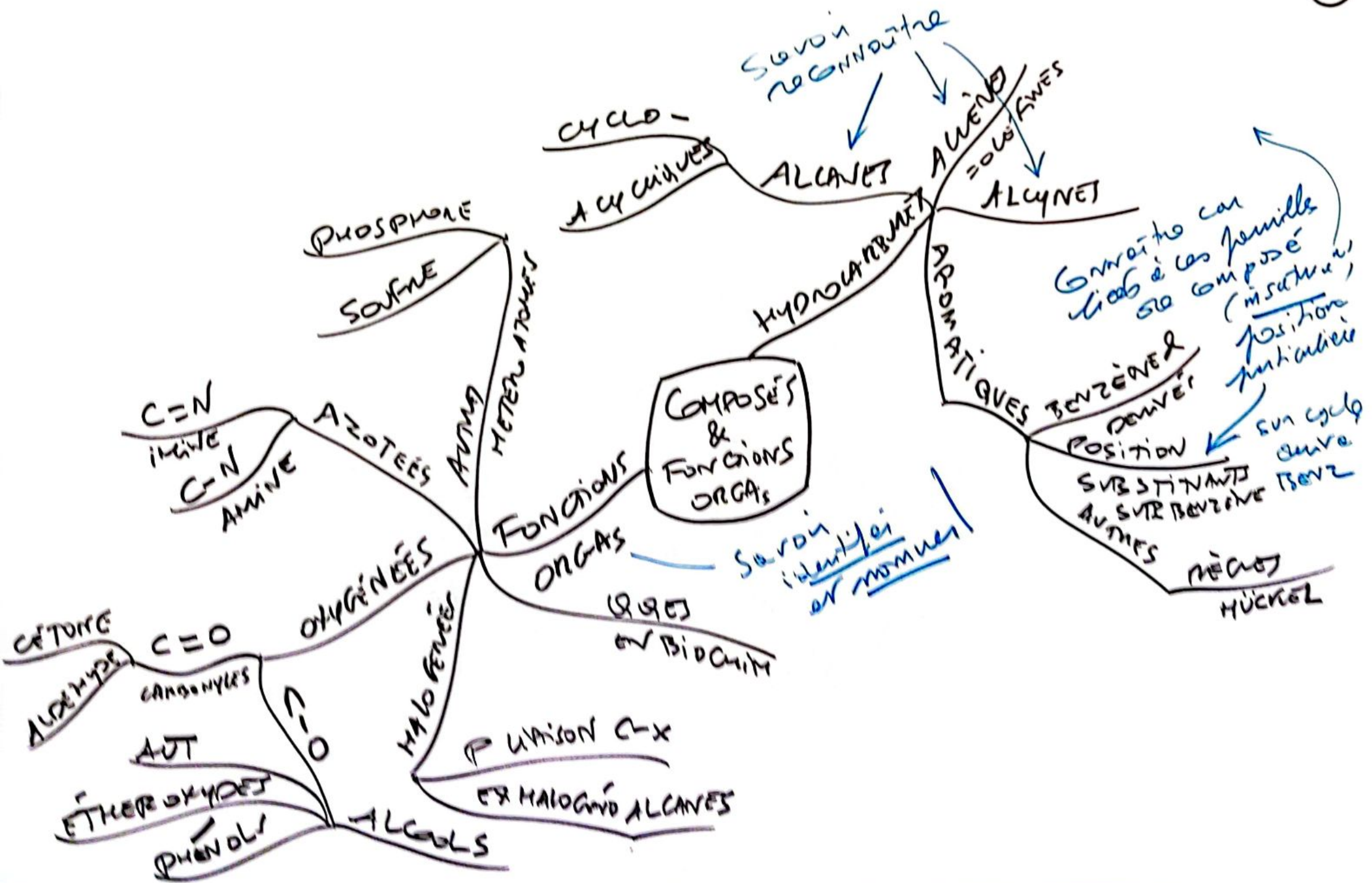
EQUIVALENCE

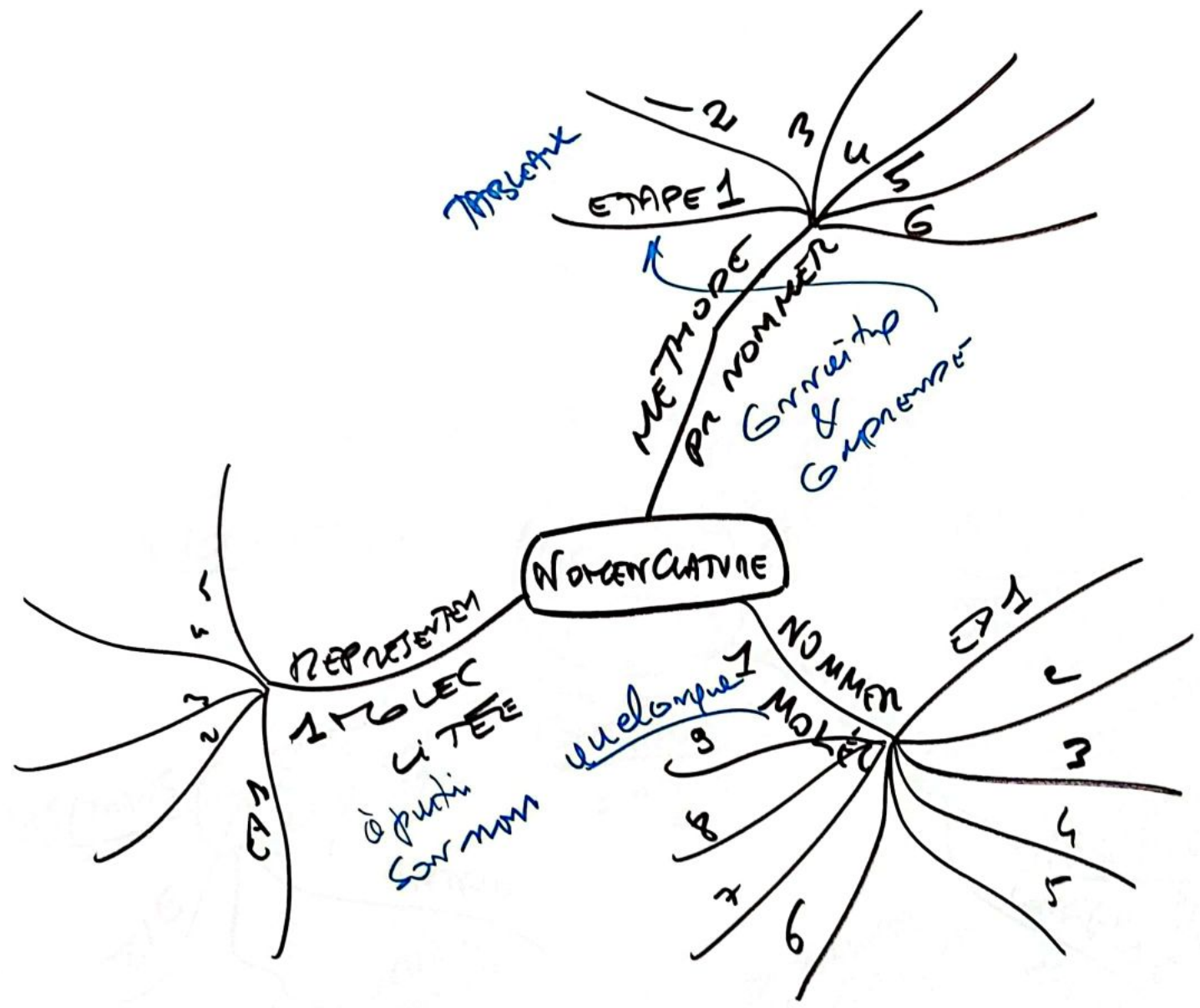
Savoir...











seron evaluar
 stablitate relative
 CN to mios

MONOSUBSTITUEES
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 CYCLOALKANES
 COMPOSES
 (Formes chaises)
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 CONFORMERES
 CONFORMATION

IDENTIFICATION
 MANUPLAN
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 NOTATION
 PRINCIPAL II
 INSATURATIONS
 FONCTIONS

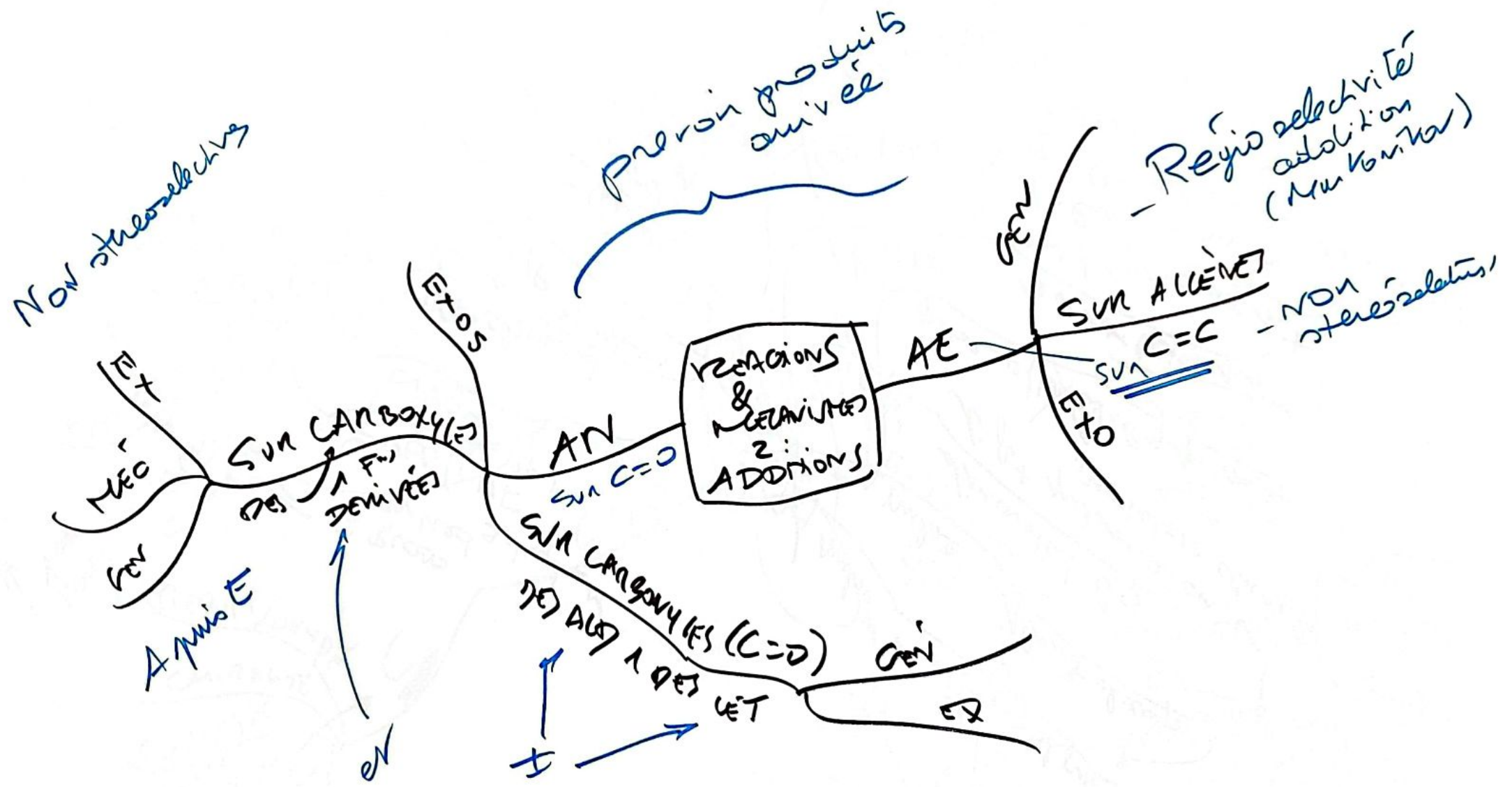
ISOMERIE
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 NEC
 NOMOR
 LIAISON
 INTRO
 CHIRALITE
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 DIASTEROMERES
 CONFIG & COMPOSE
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 MISO
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 P
 ENANT
 PHYS

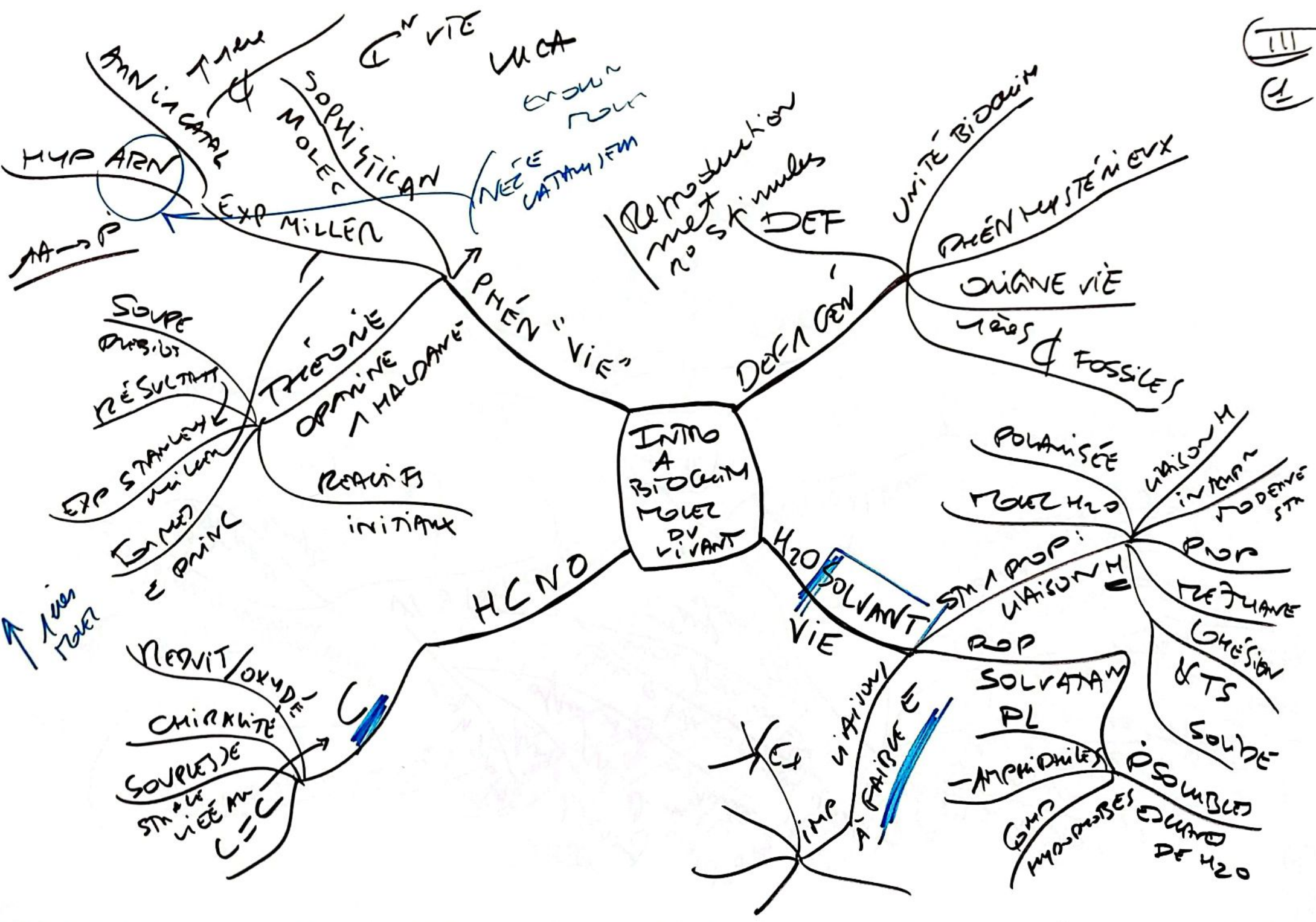
CONFIGURAN
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 INTRO
 DIAStereoisomer
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 TYPES
 REC
 CIP

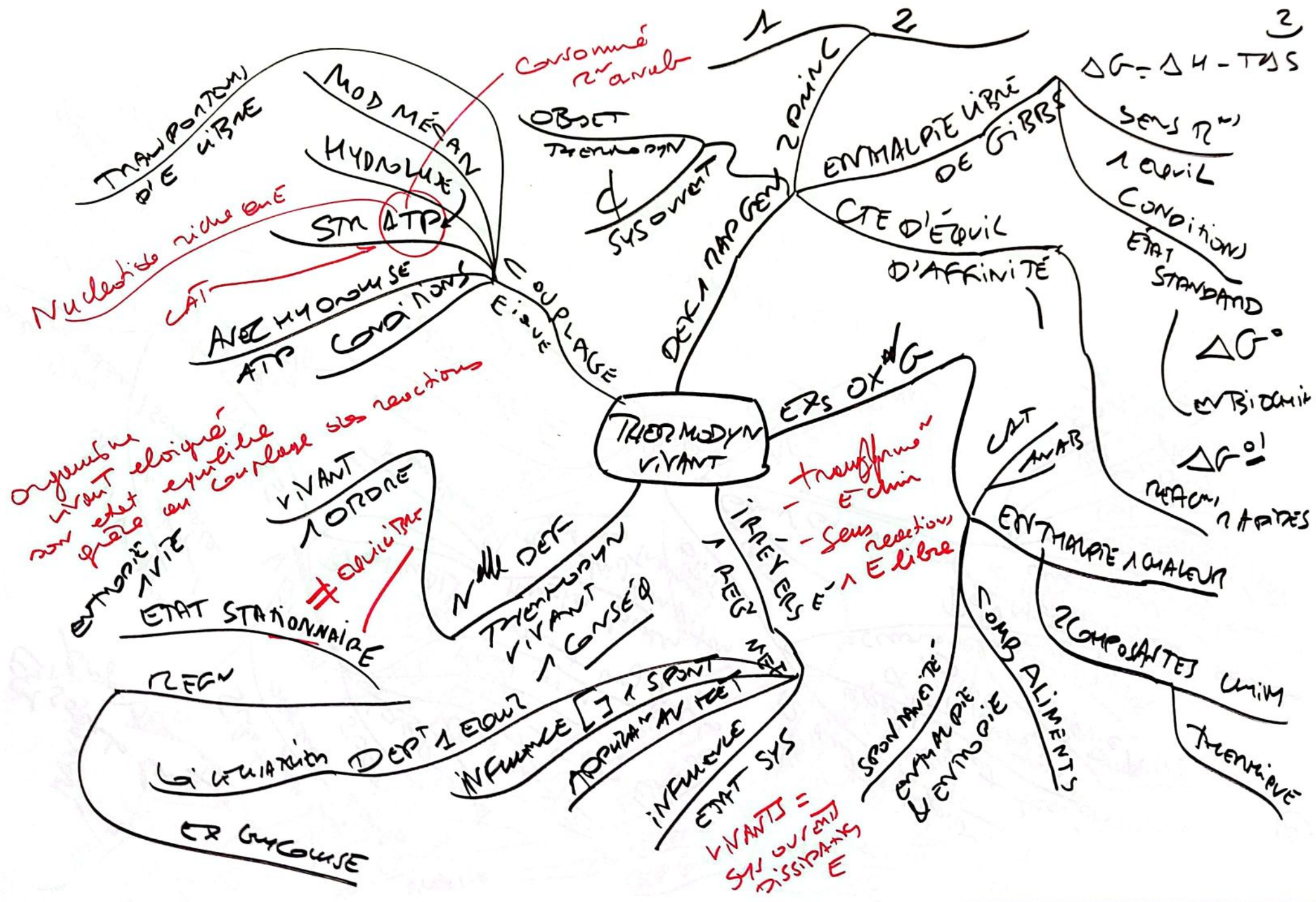
DETERMINER
 CONFIG
 ABSOLUE
 C#
 L&D
 NOTATIONS
 R&S
 REC
 CIP
 CANN-IV FOLD
 - PROOB

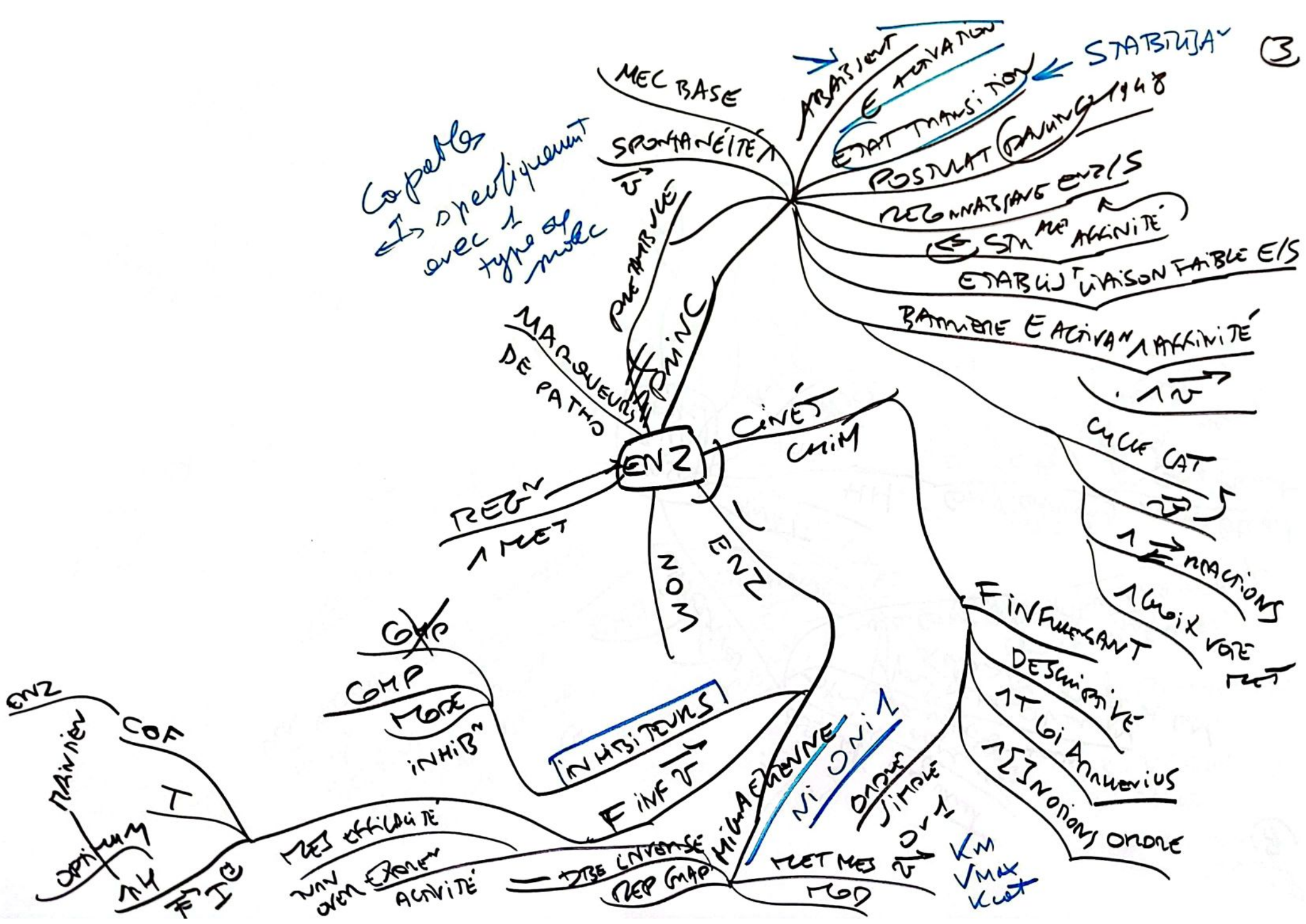
DETERMINER
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Copables
 ↳ spectiquement
 avec 1 type de molec

3

MEC BASE

SPONTANÉITÉ

PRE-ARRIVÉE

MARQUEURS DE PATHO

ENZ

CINET CHIM

REGN
 1 MET

NON ENZ

~~GTP~~
 GMP
 MOX
 INHIBⁿ

INHIBITEURS

F INF V

MICROBIE
 MACHINE
 NI ONI

DURE JIMPE
 JIMPE

METRES
 MOD

KM
 Vmax
 Kcat

ENZ
 NANNEN
 COF
 T
 OPTIMUM
 T4
 FIC

DES EFFICACITE
 NAN EXON
 ACTIVITE

DISE INVERSE
 REP GMP

FINFANT

DESIGNIVE

1T loi Arrhenius

1S] NOTIONS ORDRE

CYCLE CAT

REACTIONS
 160ix VORE
 REACT

BARRIERE E ACTIVAN AFFINITE

REGNATION ENZ/S

ESTR. AFFINITE

ETABLISSEMENT LIASON FAIBLE E/S

ETAT TRANSITION

STABILISANT

ARRASIENT

POST-AT

1948

ACTIVITE' ENZ \propto [E]

ACTIVITE' ENZ

6 types
Oxydase
Liaison
Oxyane

6 types
INTERNAL

SCON TYPE
NOM
CATALYSE
NOM

PATHO

ENZ

STGDET
PAINLI
DANX
REGN
ENZ
A
MET

DAPNES
(6)
N ~
4
N ~
CAT

- OXYDO REDUCTASES EC1 3
- TRANSFERASES ?
- HYDROLASES 3
- LYASES
- ISOMERASES 4
- LIGASES = SYNTHETASES 6

NEU ACTIVITE' ENZ
BESOIN
D'ORGANE
V'ORGANE

REGN
REGN
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REGN
G

RESPIRATORY ENZYME

ETAT "TENSE" "RELAXE"

AUSI
REGN

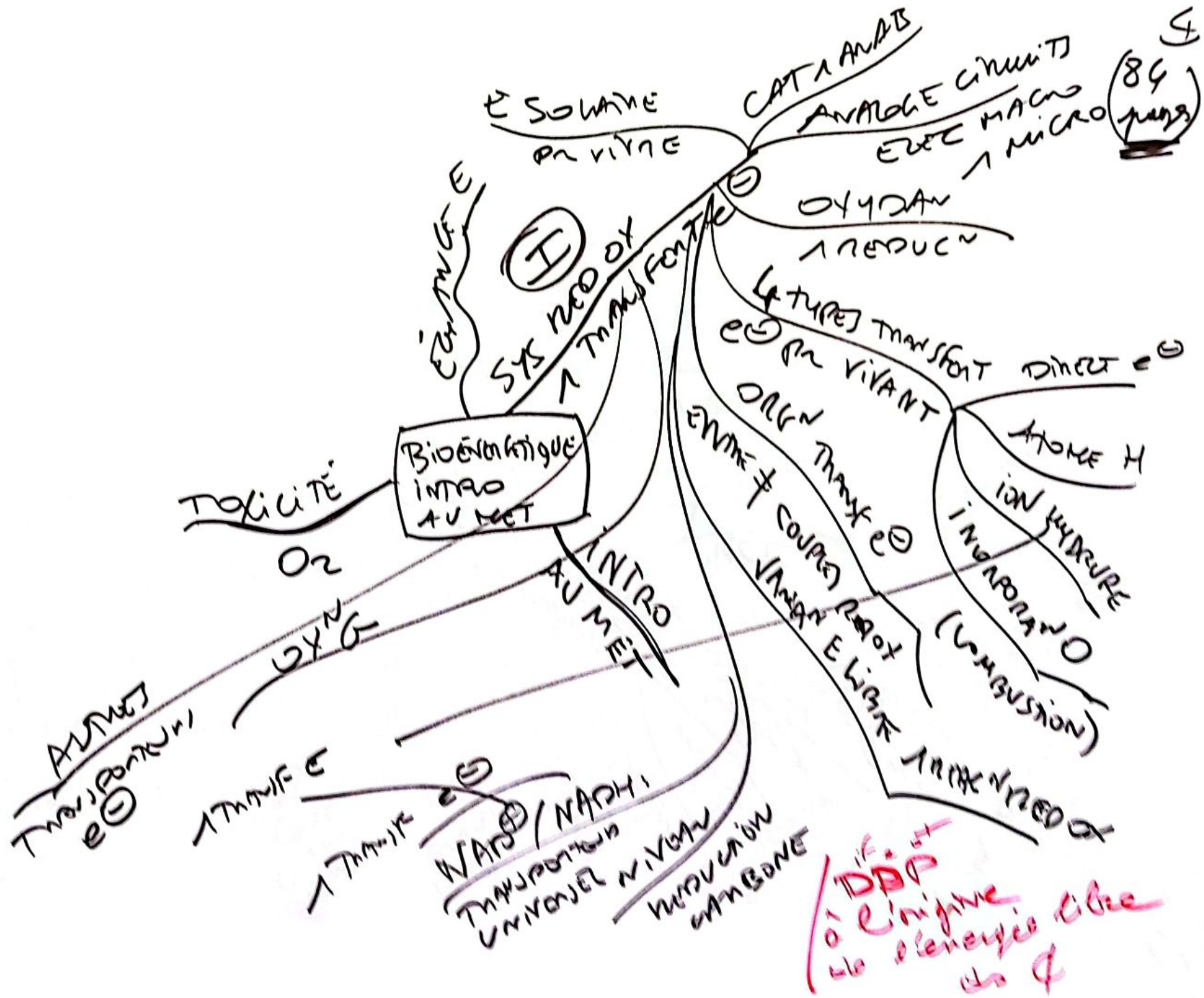
ISOMERASE
LDH

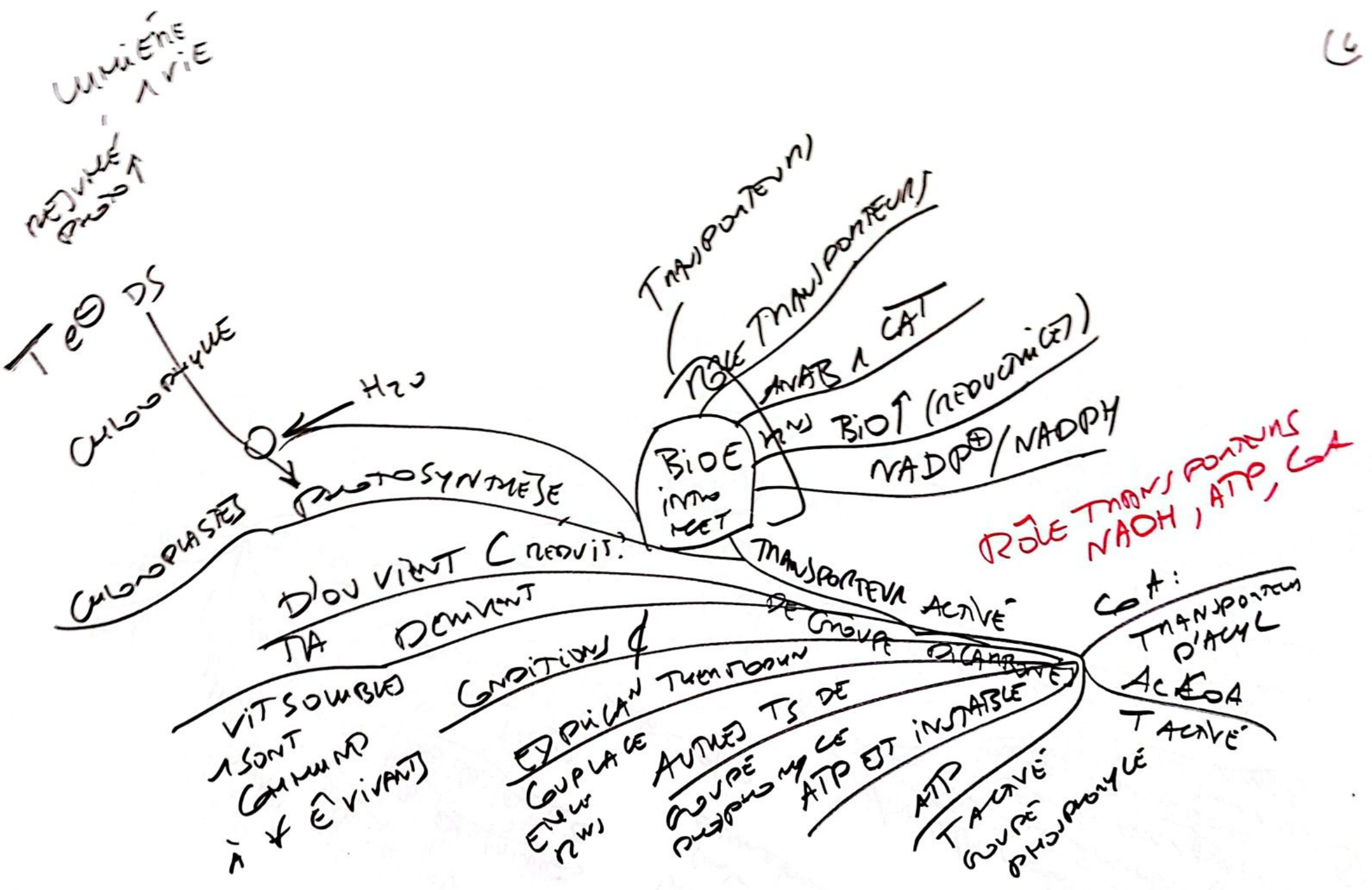
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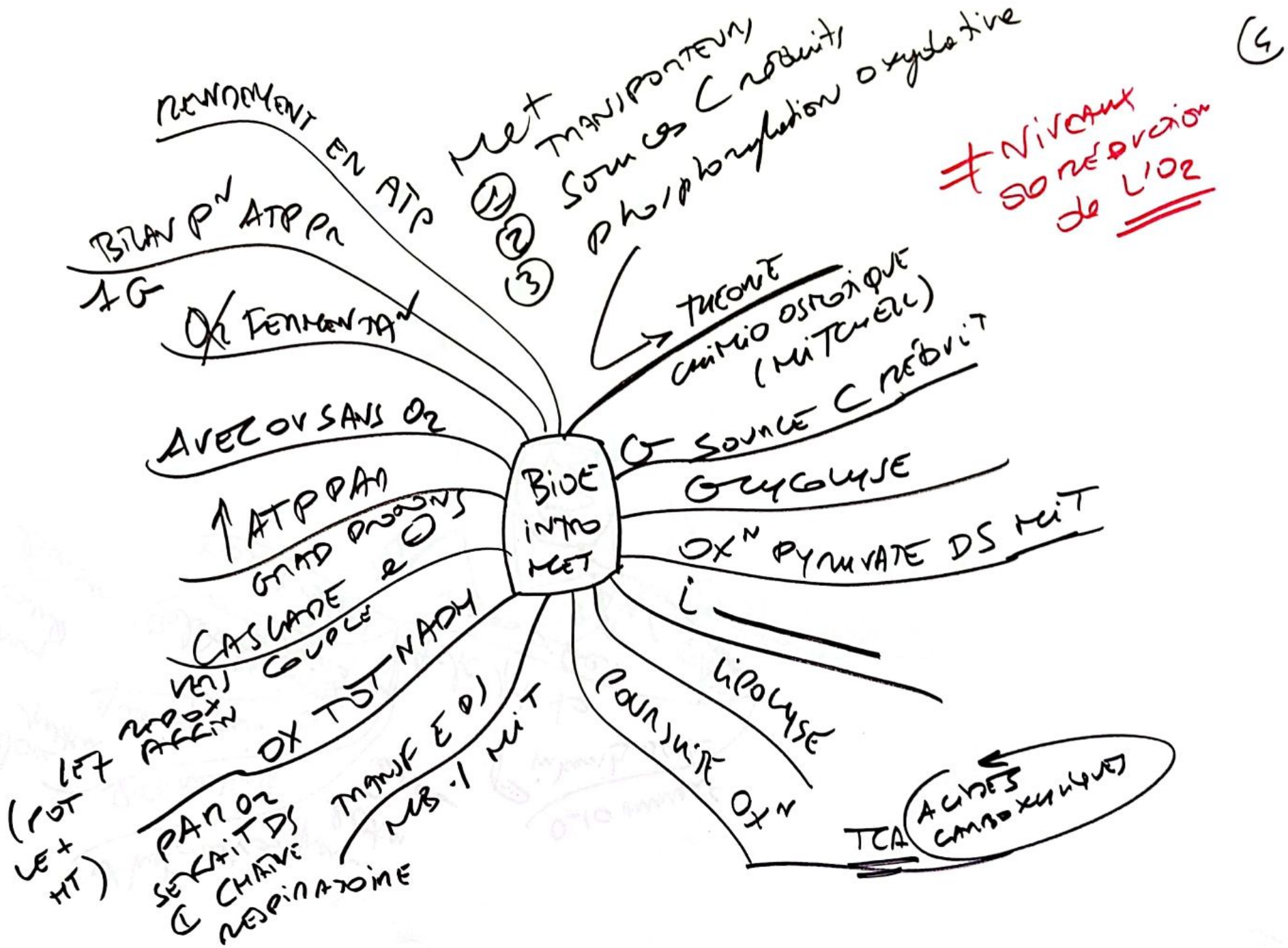
ISOFORMES

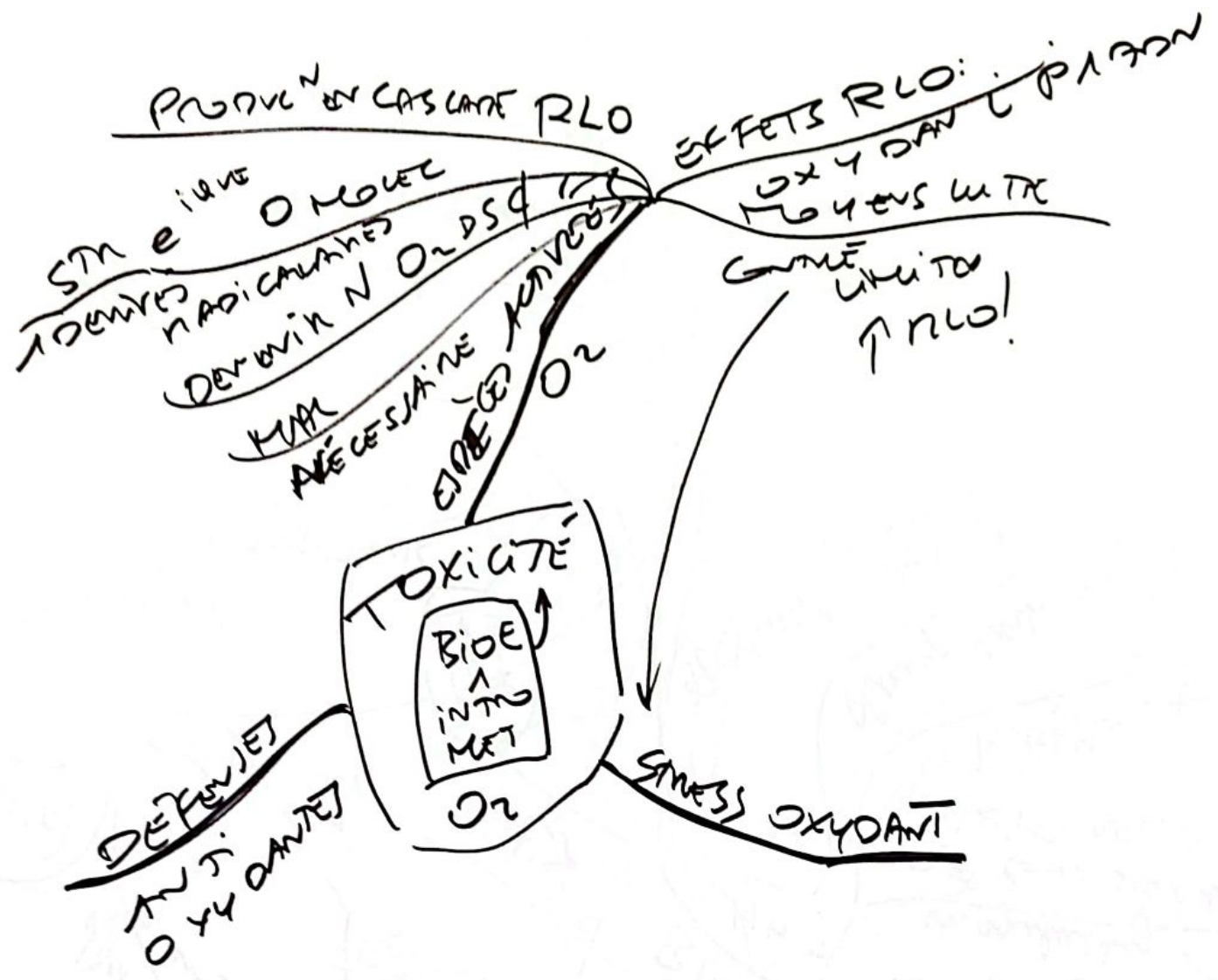
- 1 Protéolyse
- 2 P INH
- 3 V EV
- 4 AUS
- 5 GNI EXPAN
GÈNES

ACCEPTUM
TAMINAL
g'e









AA

Oxygène
 AMIDES
 ALCOOL
 thiol

CHAINES
 LATERALES
 CISTEINE
 CYSWEE
 PONT
 DISULFURE
 ALKYL
 CATT

ZOOI TION
 AMPHOTERES
 TITRATION
 CTEJ CAM
 ≠ AA
 SALON ALI
 PRINC AA
 ELEVE HYDROPHOBITE
 GRAVES LAT KYTE 1 DOOUTE

1 cistine
 SF G
 SEULE C2
 21 AA
 DS P

AA
 PROPRIETES
 PHYSIOL
 CHIMIQUES

CLASSIFICATION
 EN FONCTION
 POLARITE
 CHANGE GRAVE
 LAT A NY NOUVE

E/MON E

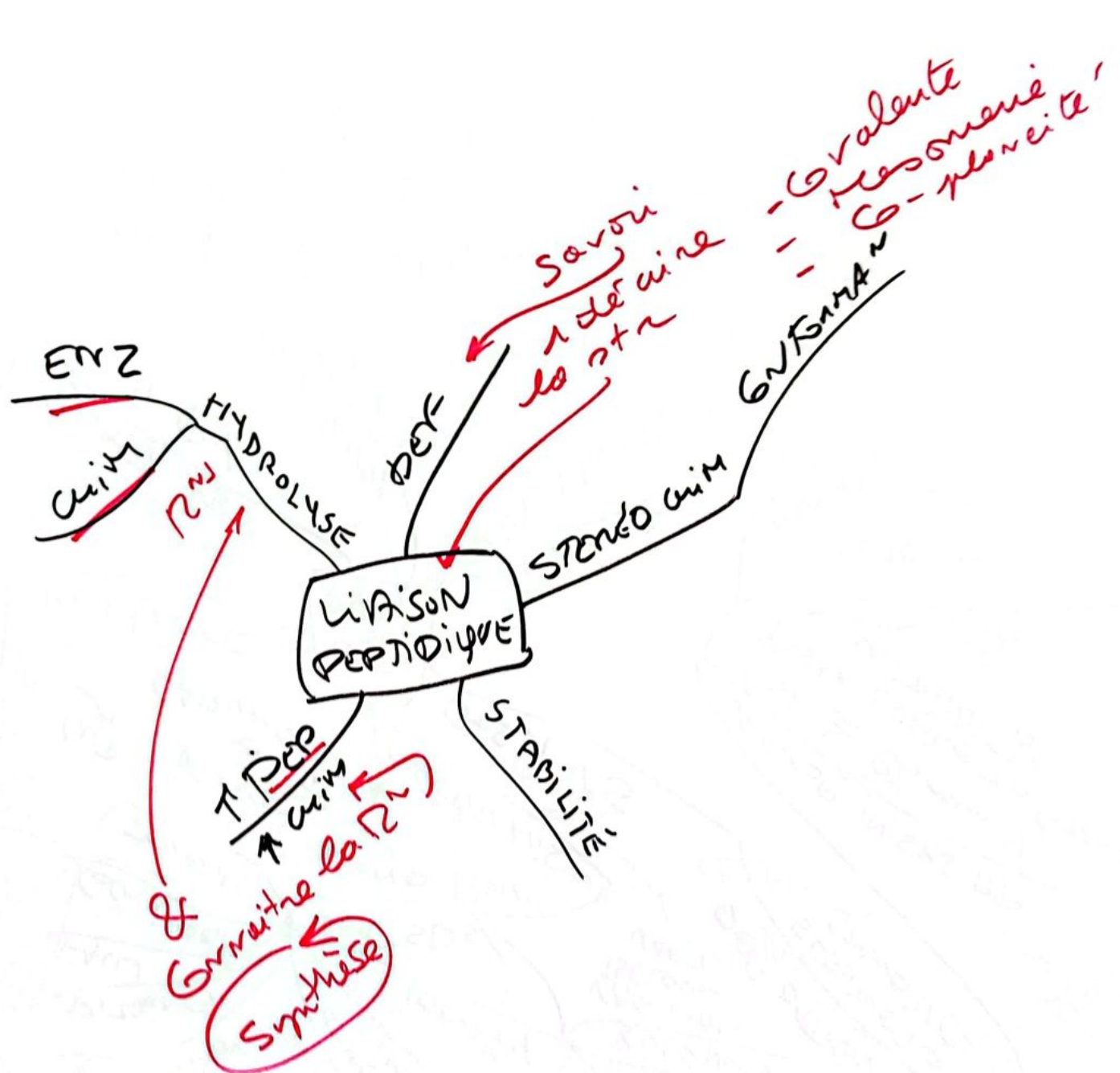
Somme
 de
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 vallope AA

CHROMATO
 COWNE ÉGALKE
 C@

CHIM
 ET GMP SEPARA
 EVASION
 N A NIN HYDRAE
 DEAMINA
 OXYDATIVE
 N GOBAE
 N NH2

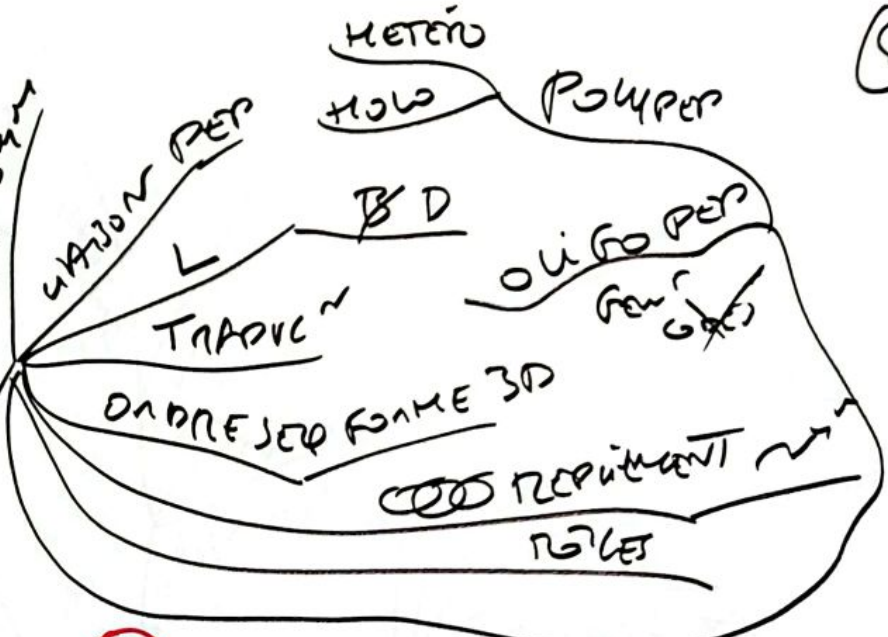
GNAIMI
 SM A P
 CHINO
 LAT

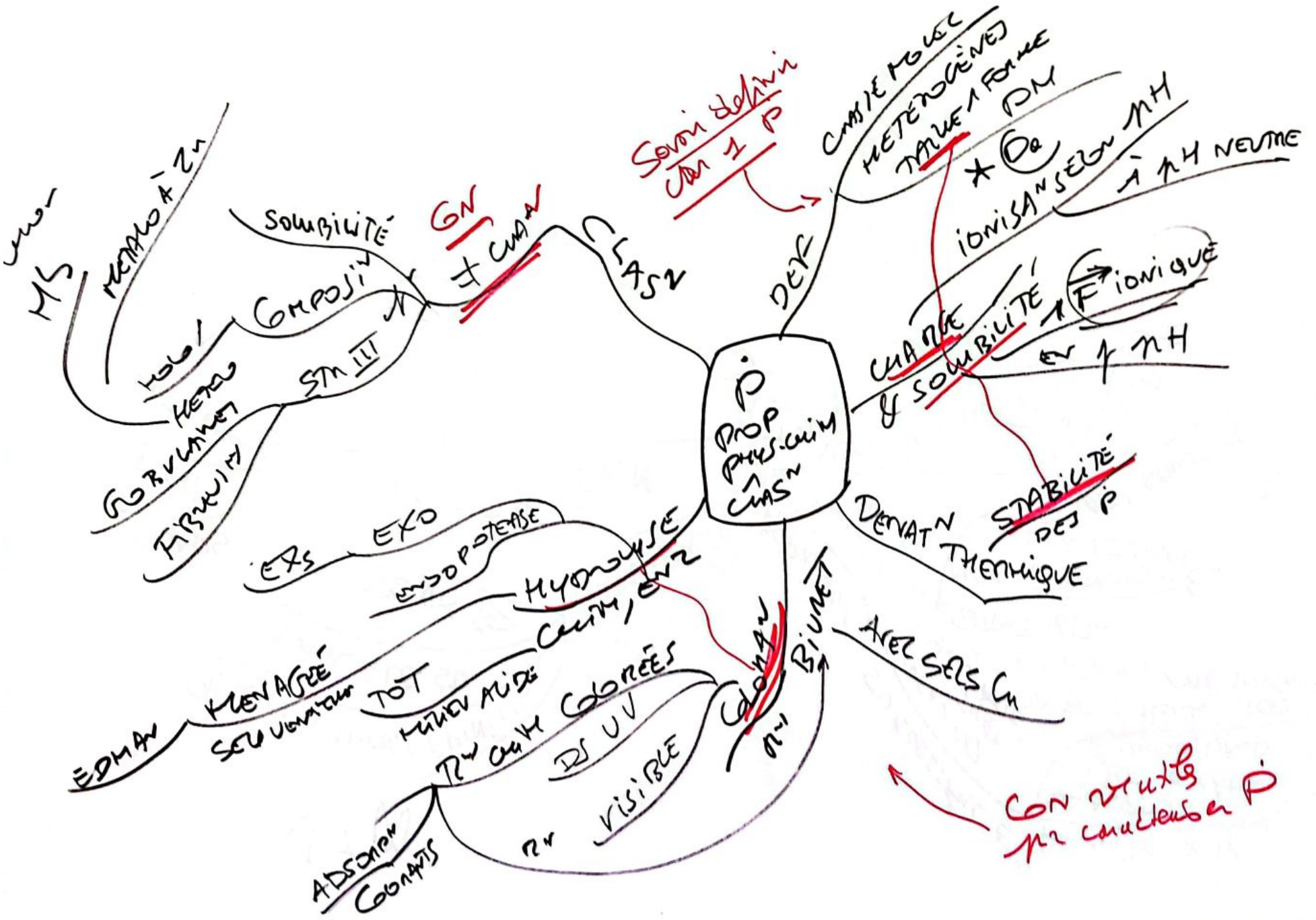
PHYS
 SOLUBILITE
 COULEUR 1 ABSN
 1 ABSN
 1 ABSN
 UV
 POUVOIR ROTATIONE CASYM



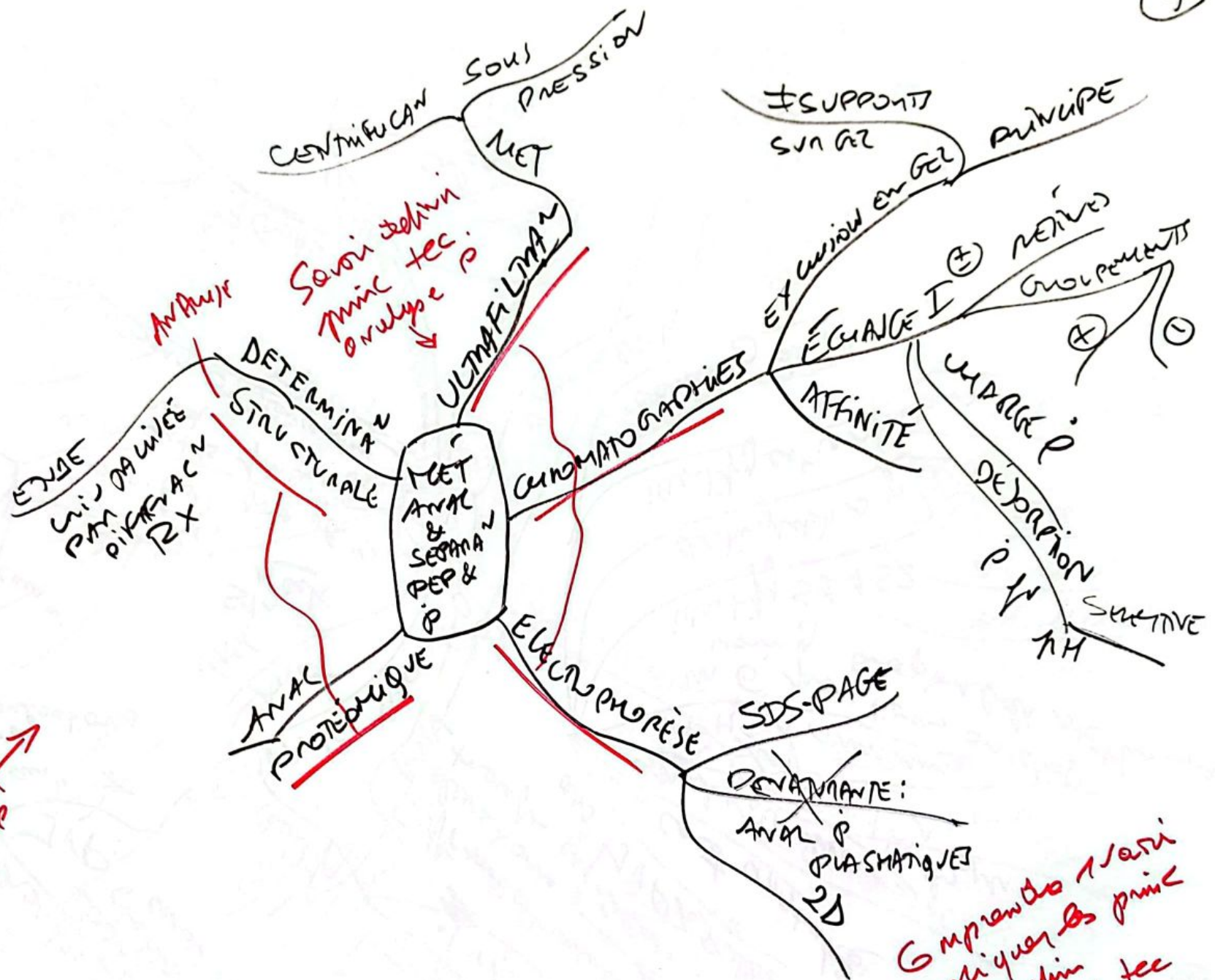
PONT S-S
UNISON) — H
— ionique
— INTERACTIONS HYDROPHOBES

GN ≠ NIV STR
1E23 STR NIV
PERMEABILITÉ
LOW REQUIRMENT



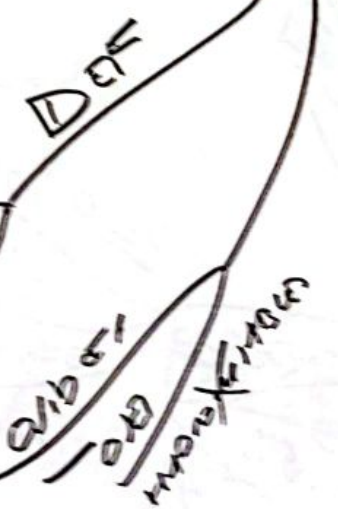
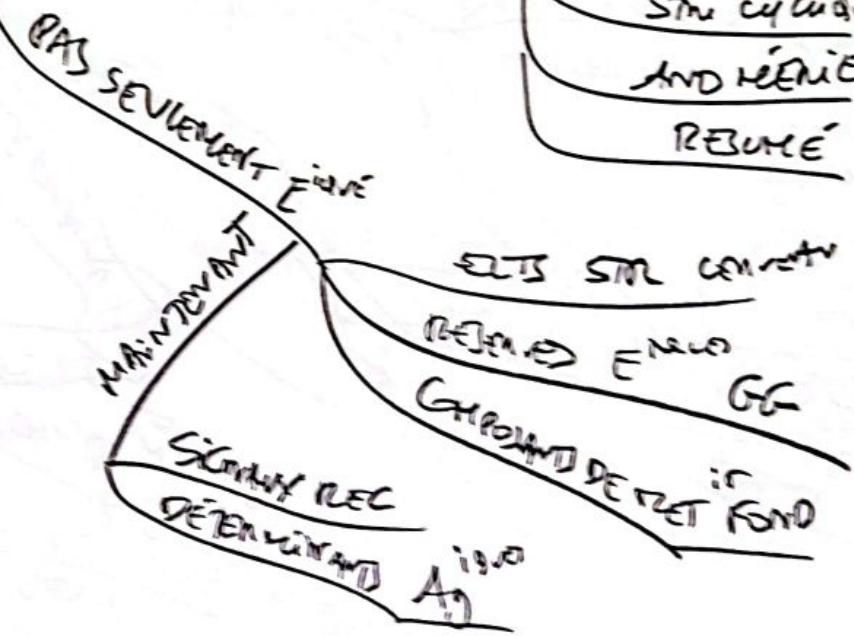
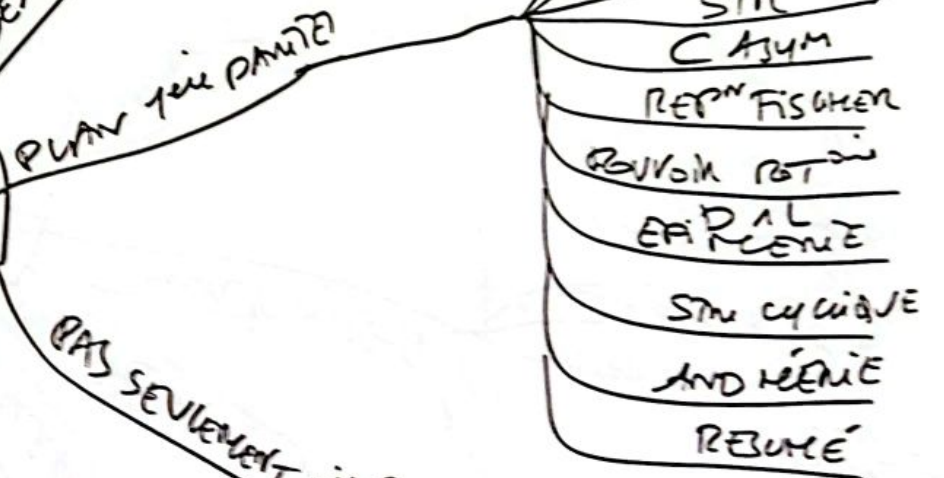
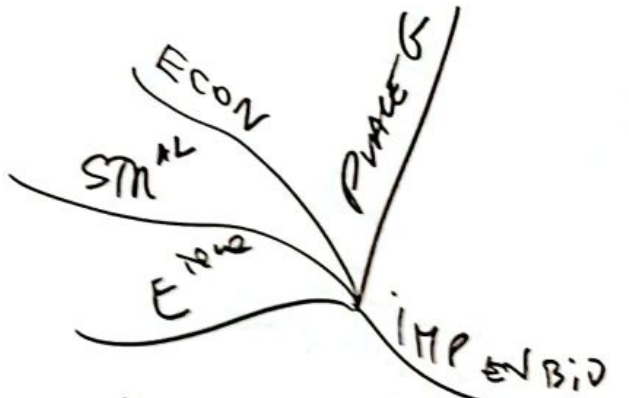
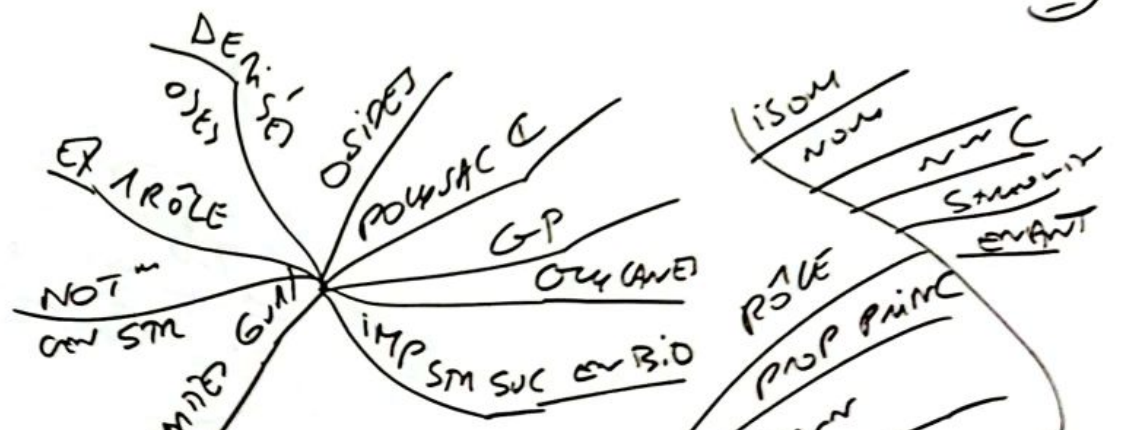


CON TRUITS
 PR CAS^N EN P

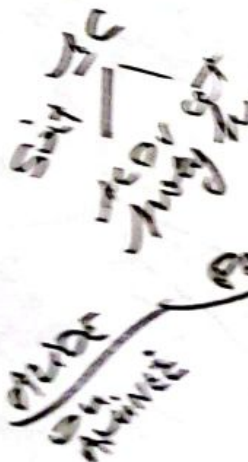
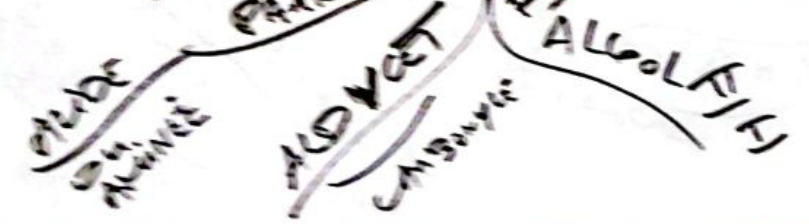
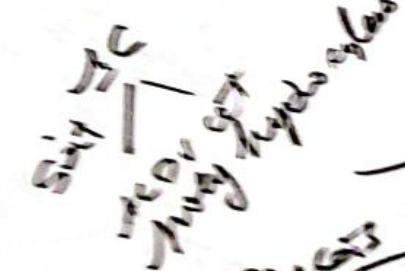


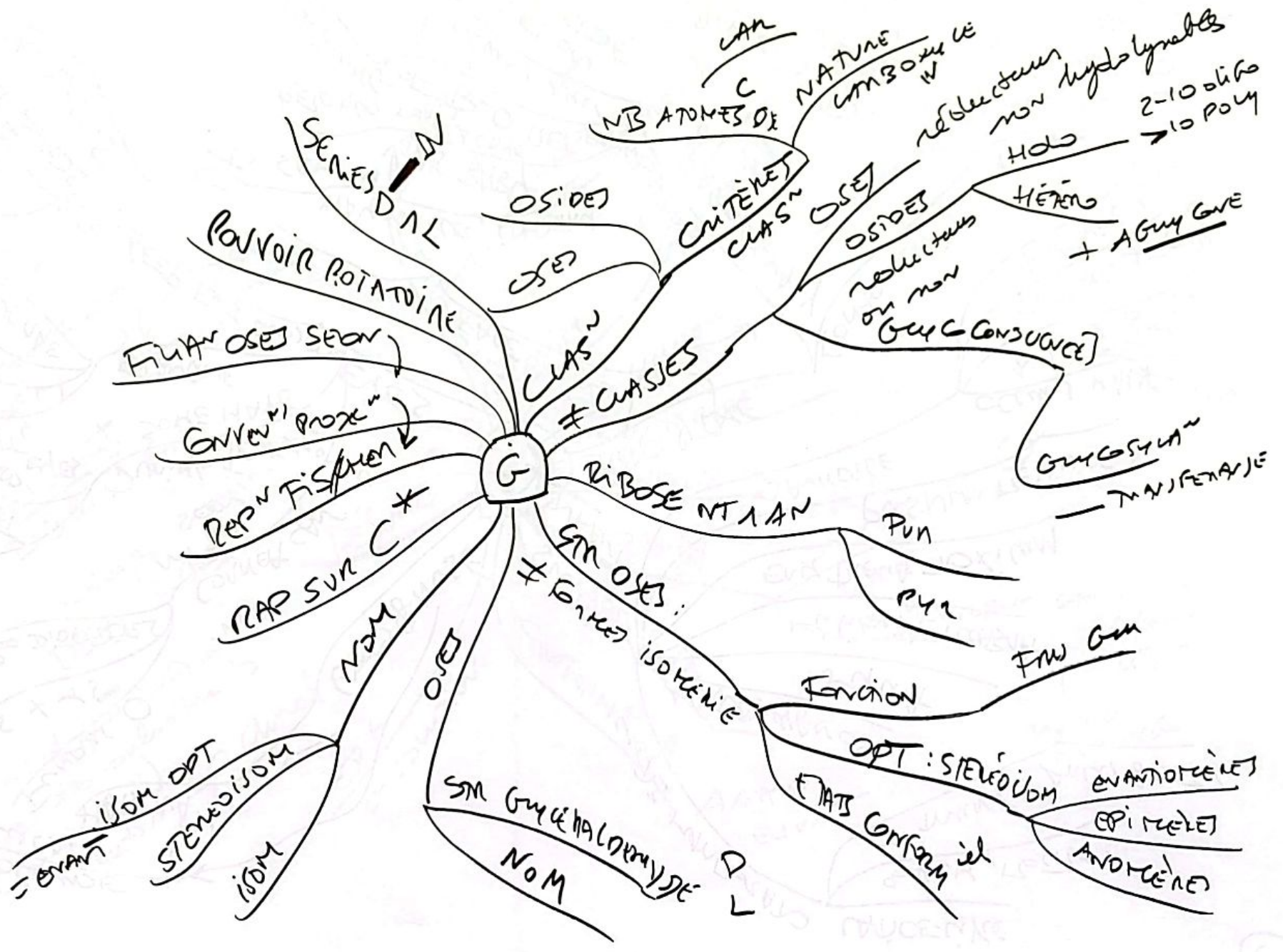
Gr de séparation
 met anal
 + complex p

Comprendre aussi
 expliquer les principes
 phys dans les techniques
 de séparation

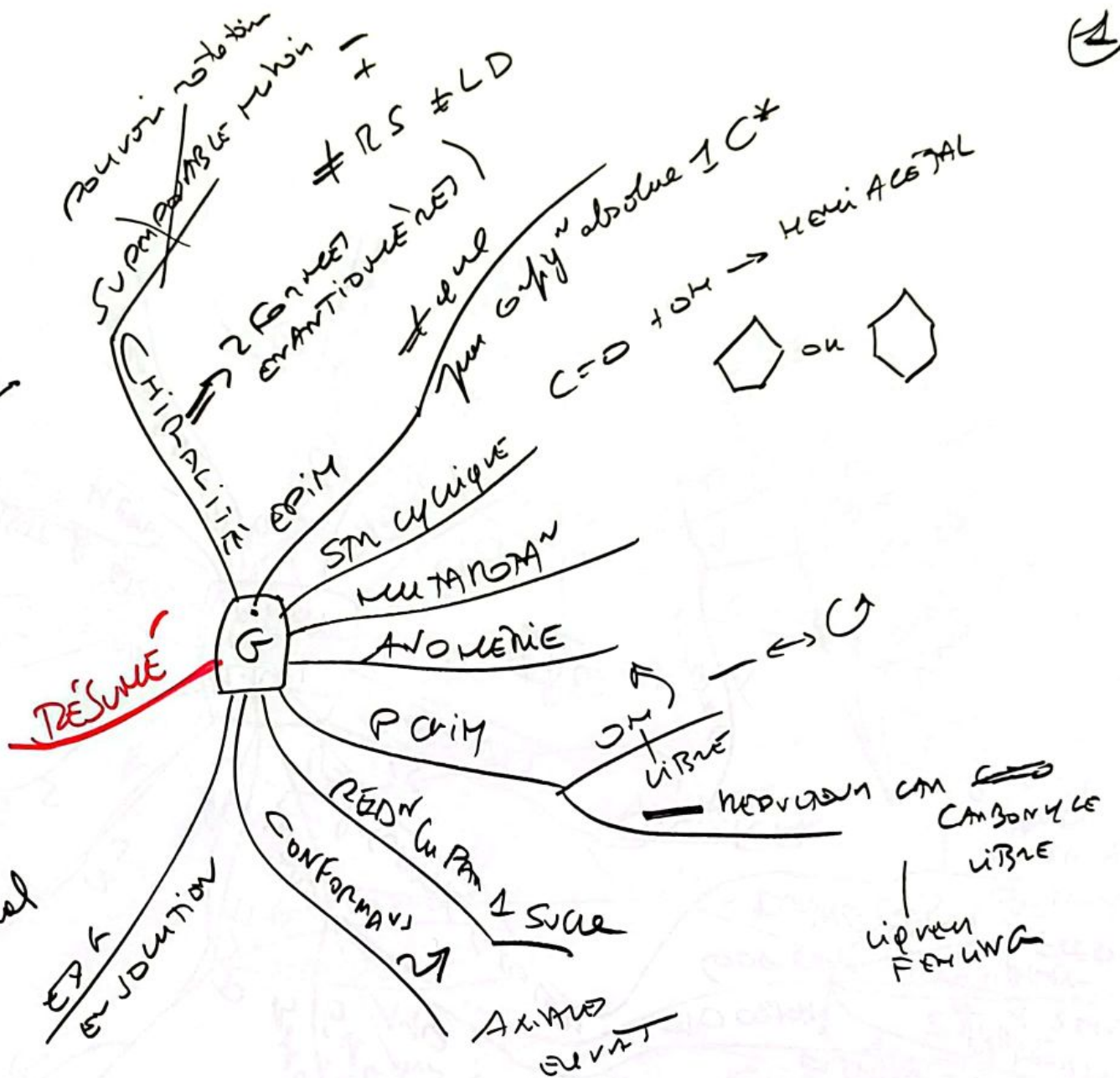


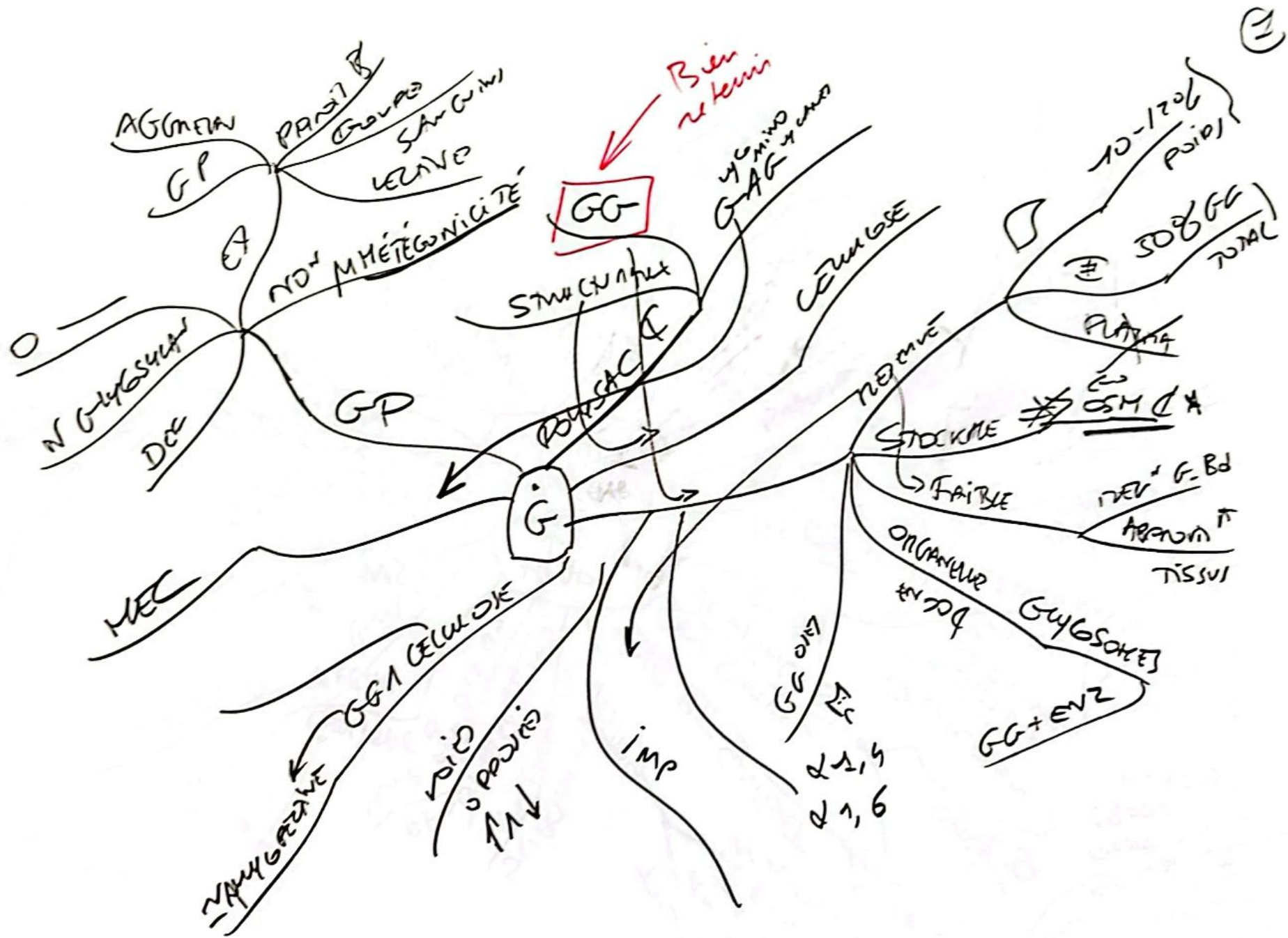
Merci
à l'Université

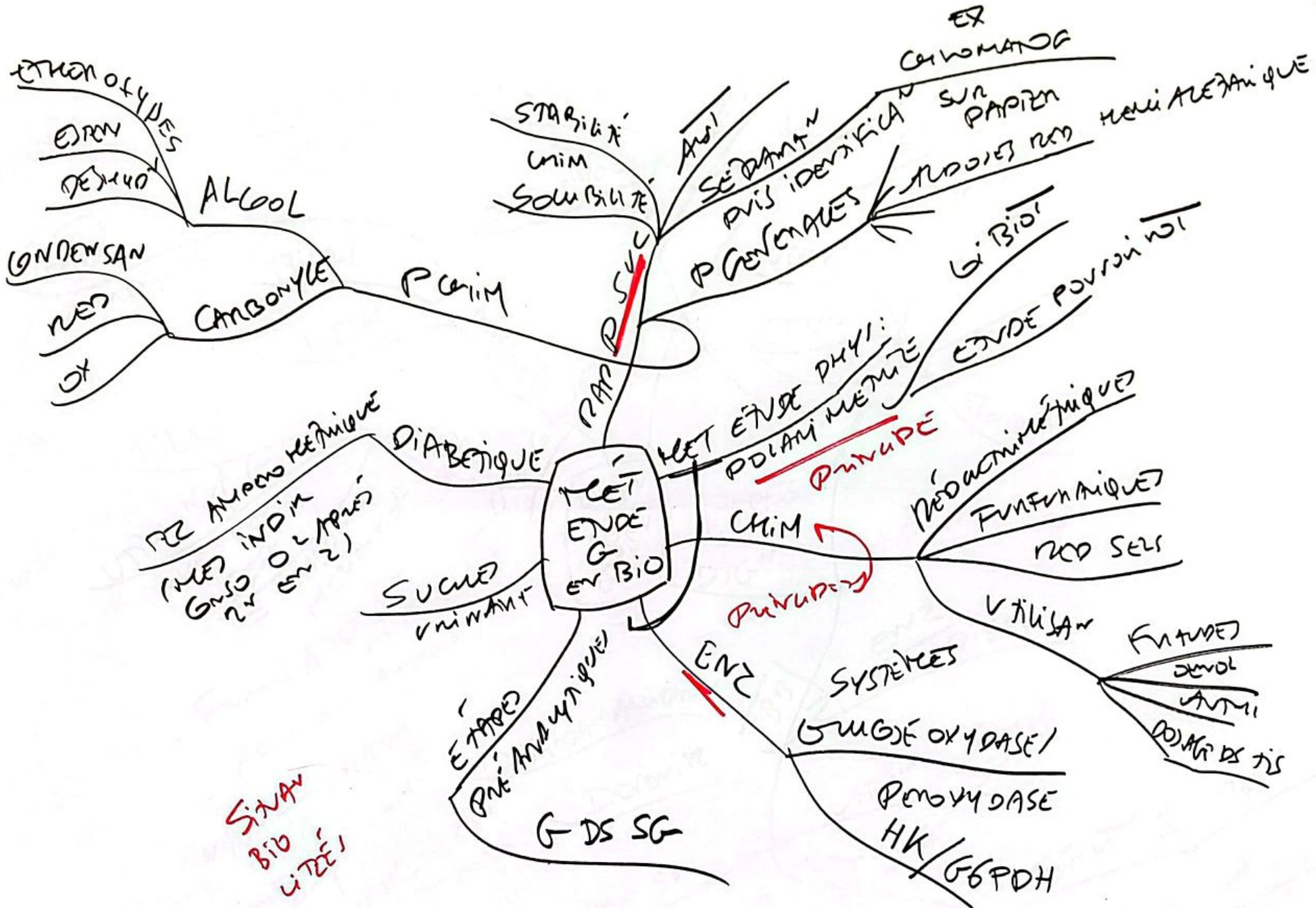




- anomères: ≠ pour un seul C anomérique
- Epimères ≠ niveau 1 seul C chiral (supra)
 - D-Glu L-Gal
 - D-Glc D-Gal
 - D - Dmann
- dia: stéréoisomères non énant.
- énant: qui sont des images en miroir
 - D-Glu L-Glc
- Stéréoisom: ≠ pour disposition des esp des substituants autour d'un C chiral







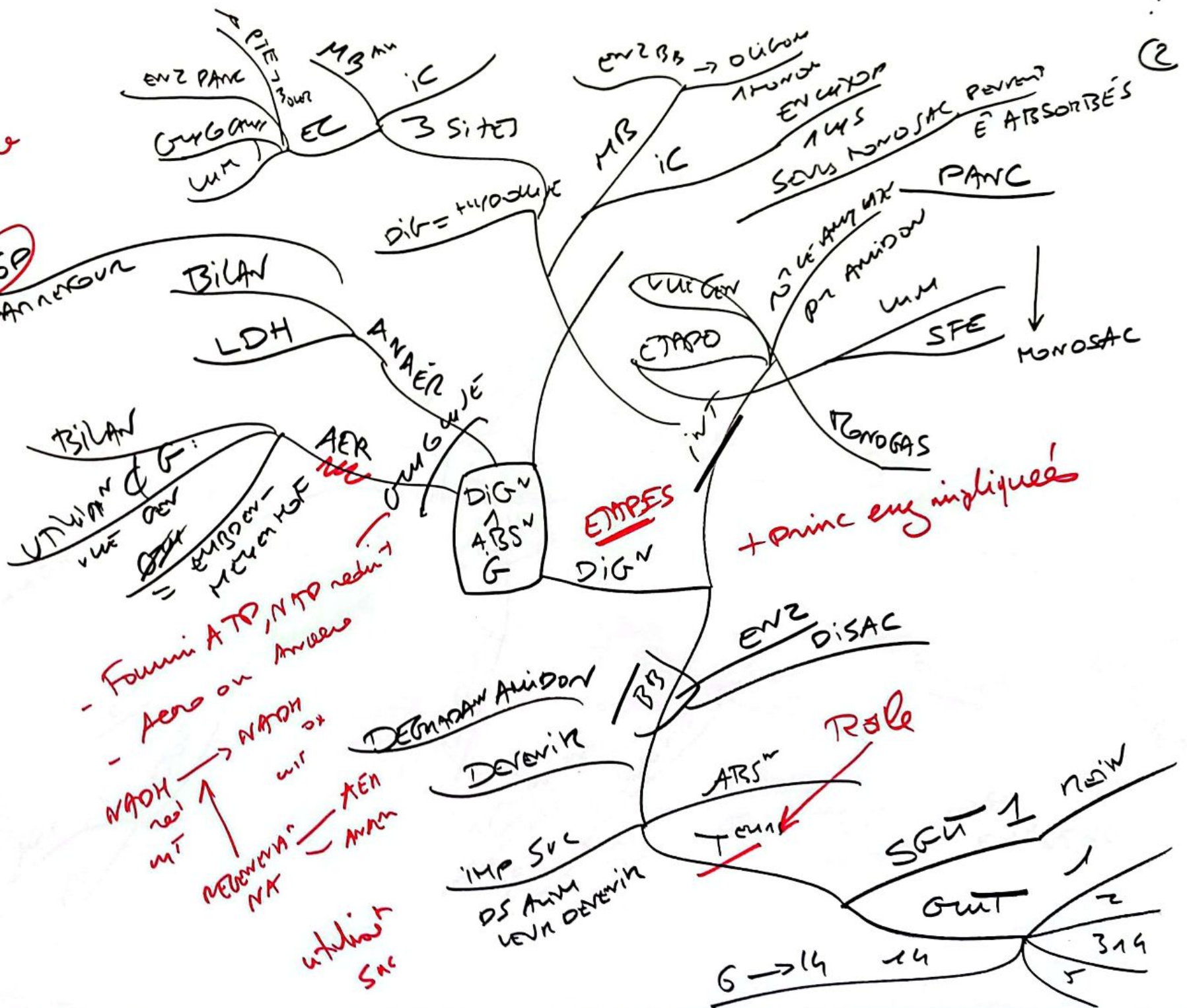
SI MA
BIO
LITTE

Bilan Eiquis
globe

intérior
glycogène
globe

vue
généraliste

G6P
cannégon



- Fourni ATP, NADP réduits
- Acide ou Ammoniac

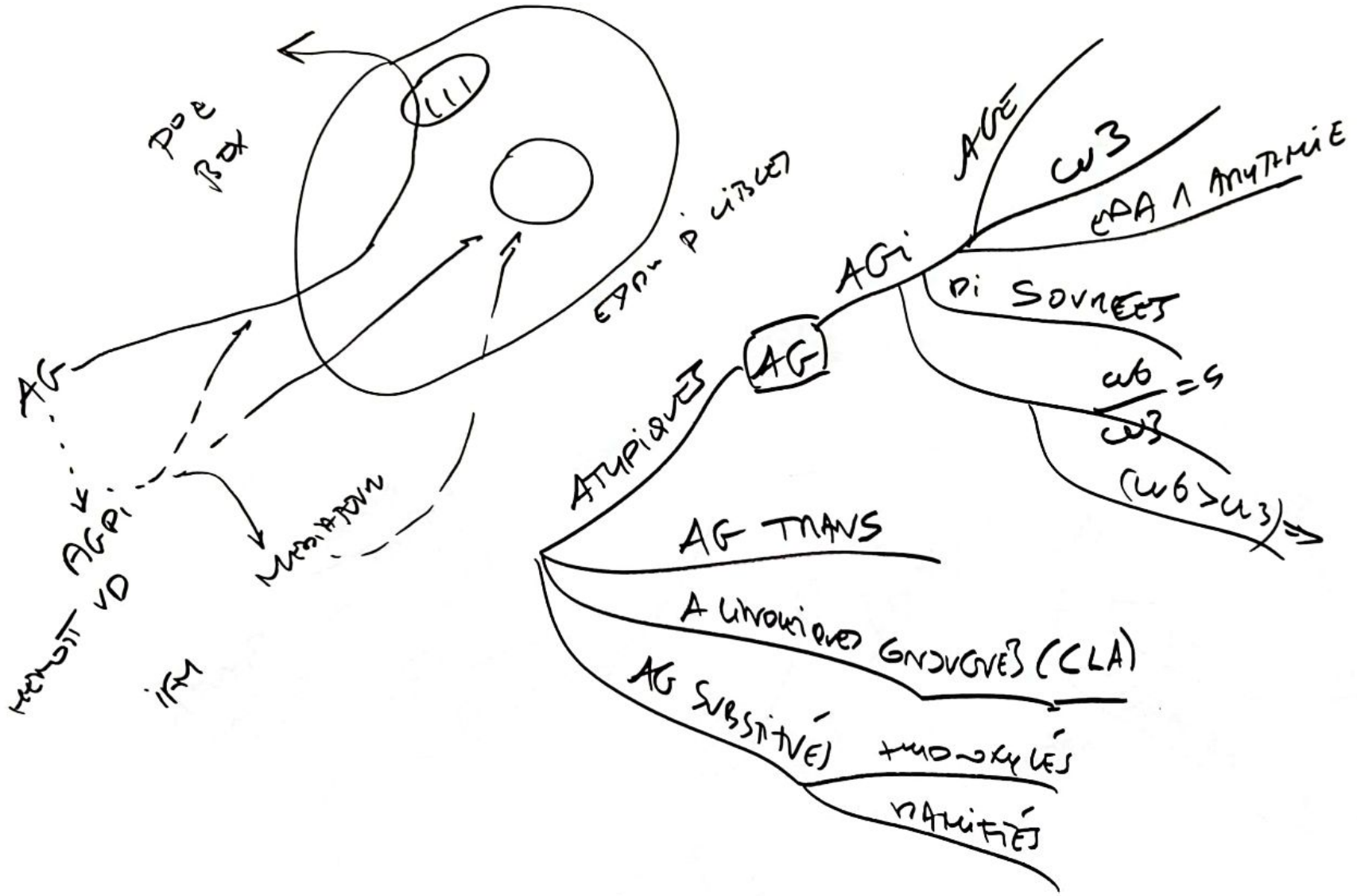
NADH red. MIT → NADPH ox. MIT
 PERMÉABILITÉ NA → AEN AMAM

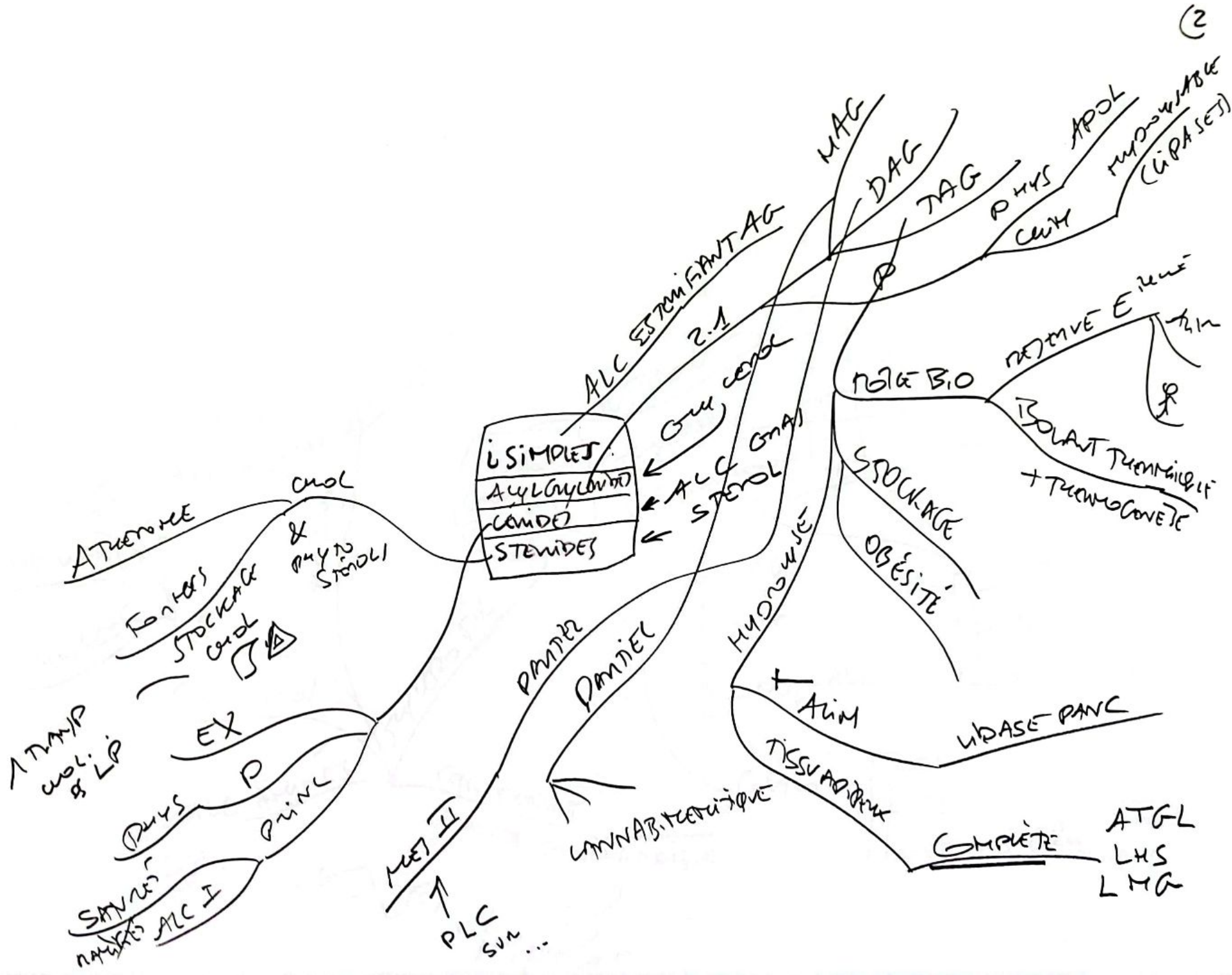
utilisent
Sac

+ princ enzymes impliquées

LA ALA DMA

GMP SON MB1





DIG
ABS
TRANS

PRINC CLASSES

DEVIL'S
= GOLF KOTAN
LIG EEP
GMPN L P

ABS
L+CHO

SB

Glycerol

MAG

CHO



APOB48

cholesterol

assembly

AG W/AMV
GMTE

CM

MALABSS^N STEROLANÉE

DS CIRCUITAN

TG

CHO

AG

PL

AGL-ALB

OV LP

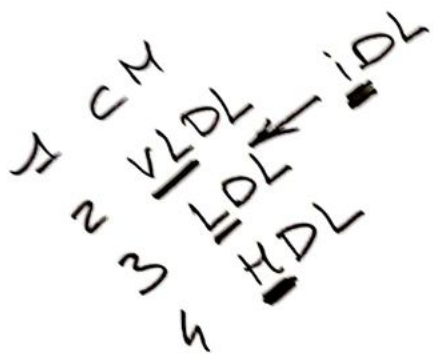
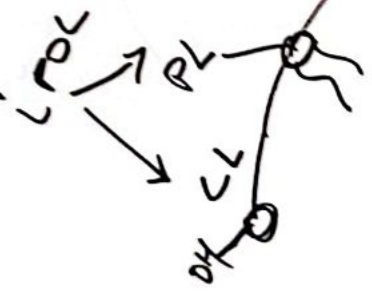
LIPOP

L+CHO

Lipid
Lipid
TG
STEROL
CEsterif

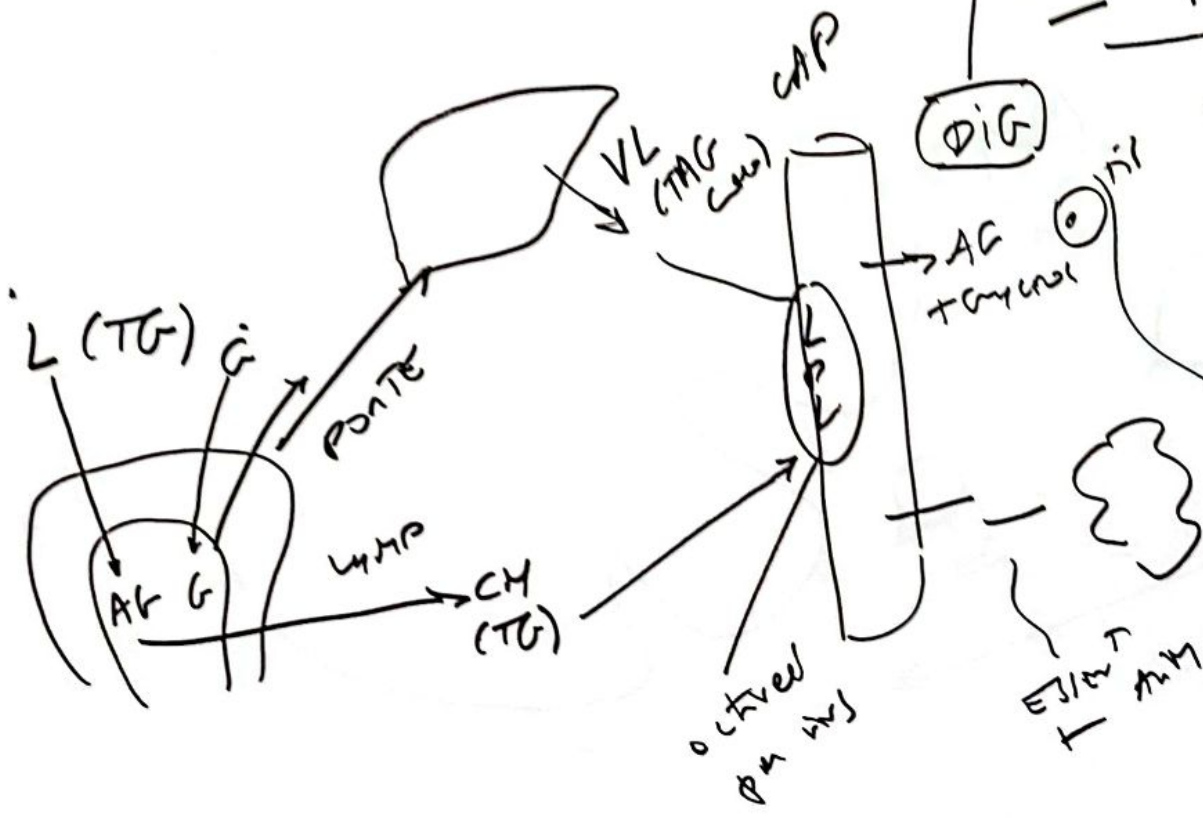
KPOP

EVZ



	H	L	VL	C
Densité	1,063 0	-	0,5 20.40	< 0,1 > 400
% P	50%	25%	10%	1%
L	50%	75%	30%	99%
Préval obm	PL	C	TG	TG
P	A	B100	B100	B68

Cher
Fert



Reverse
C

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TAG
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LXOG
+ int

H / C
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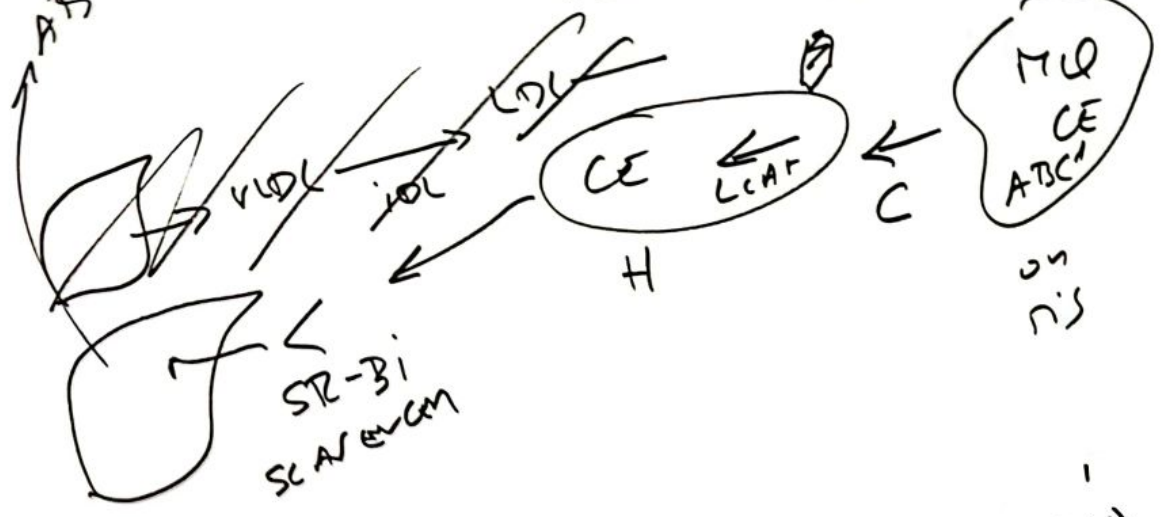
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GN ← TIS pulvino
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Component CAP

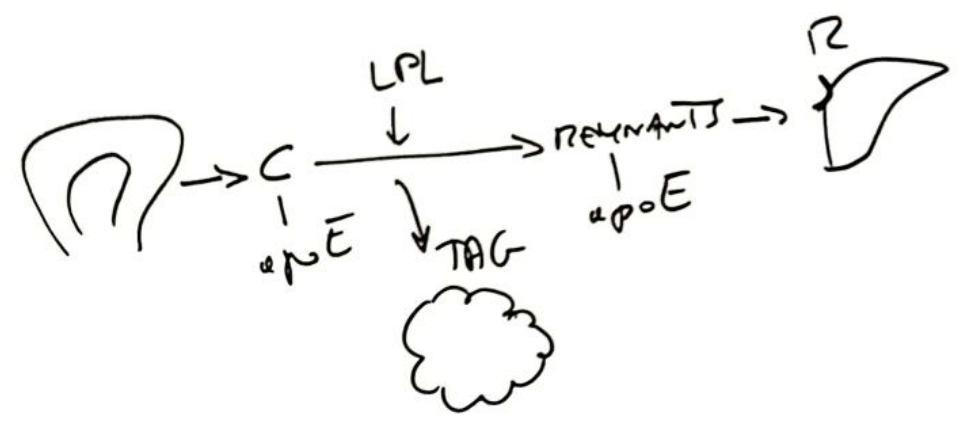
56 B10

AB → B → C → ...

Hü NIVEAU
VOIE REVERSE

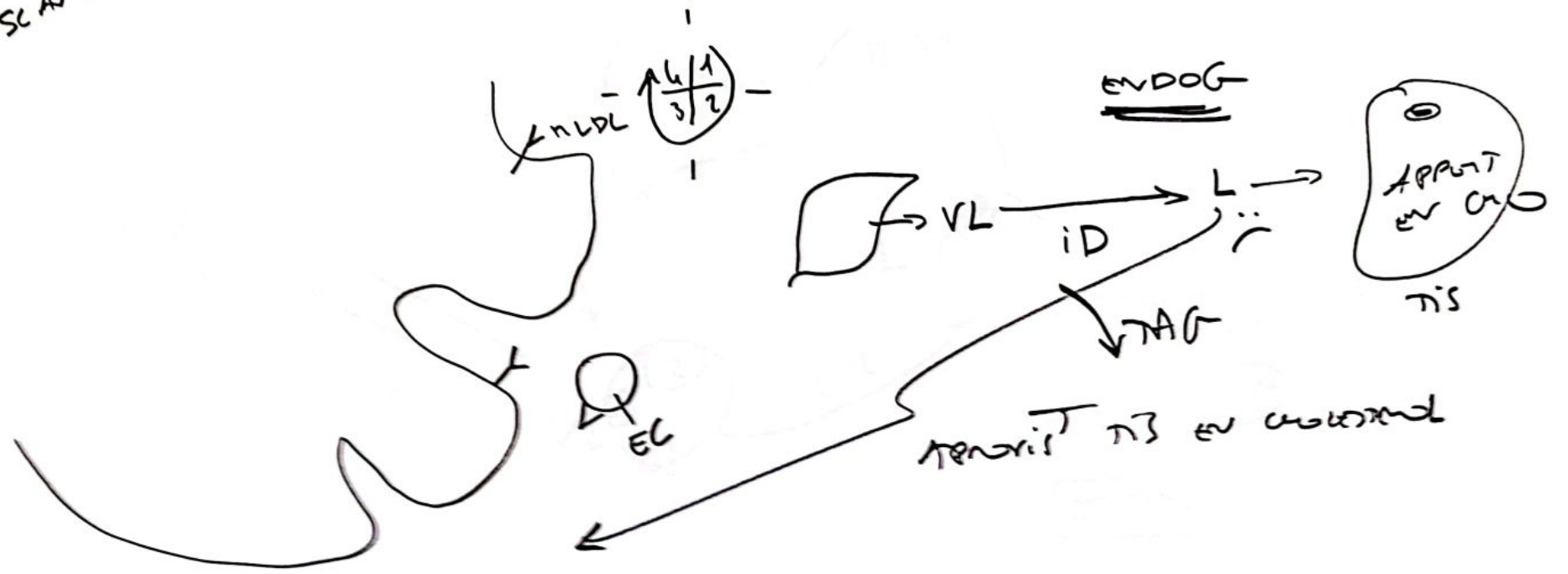


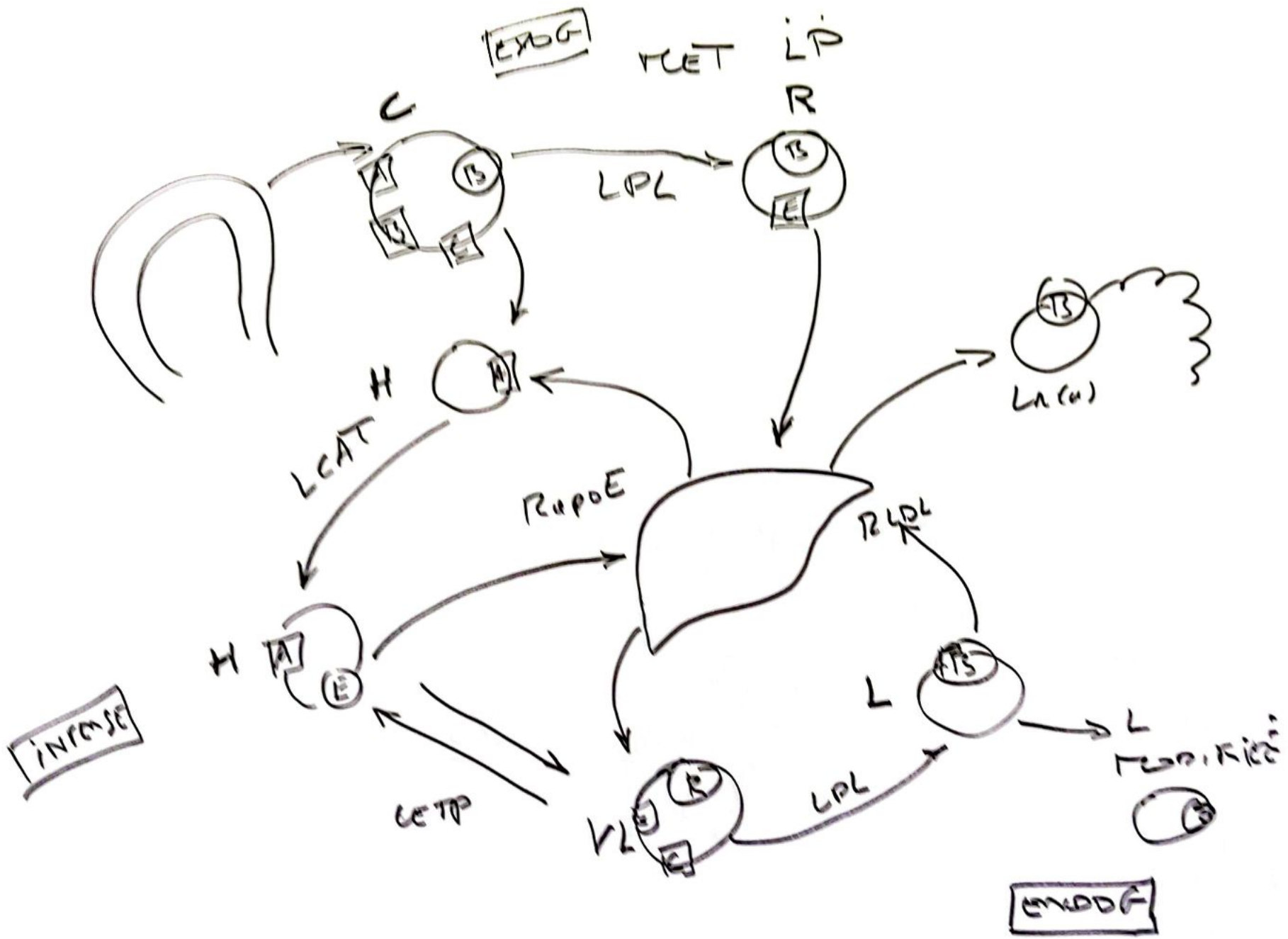
VOIE EXOG

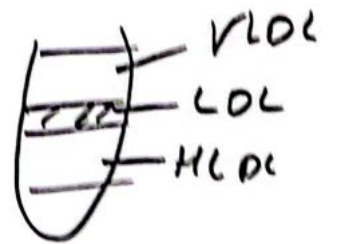
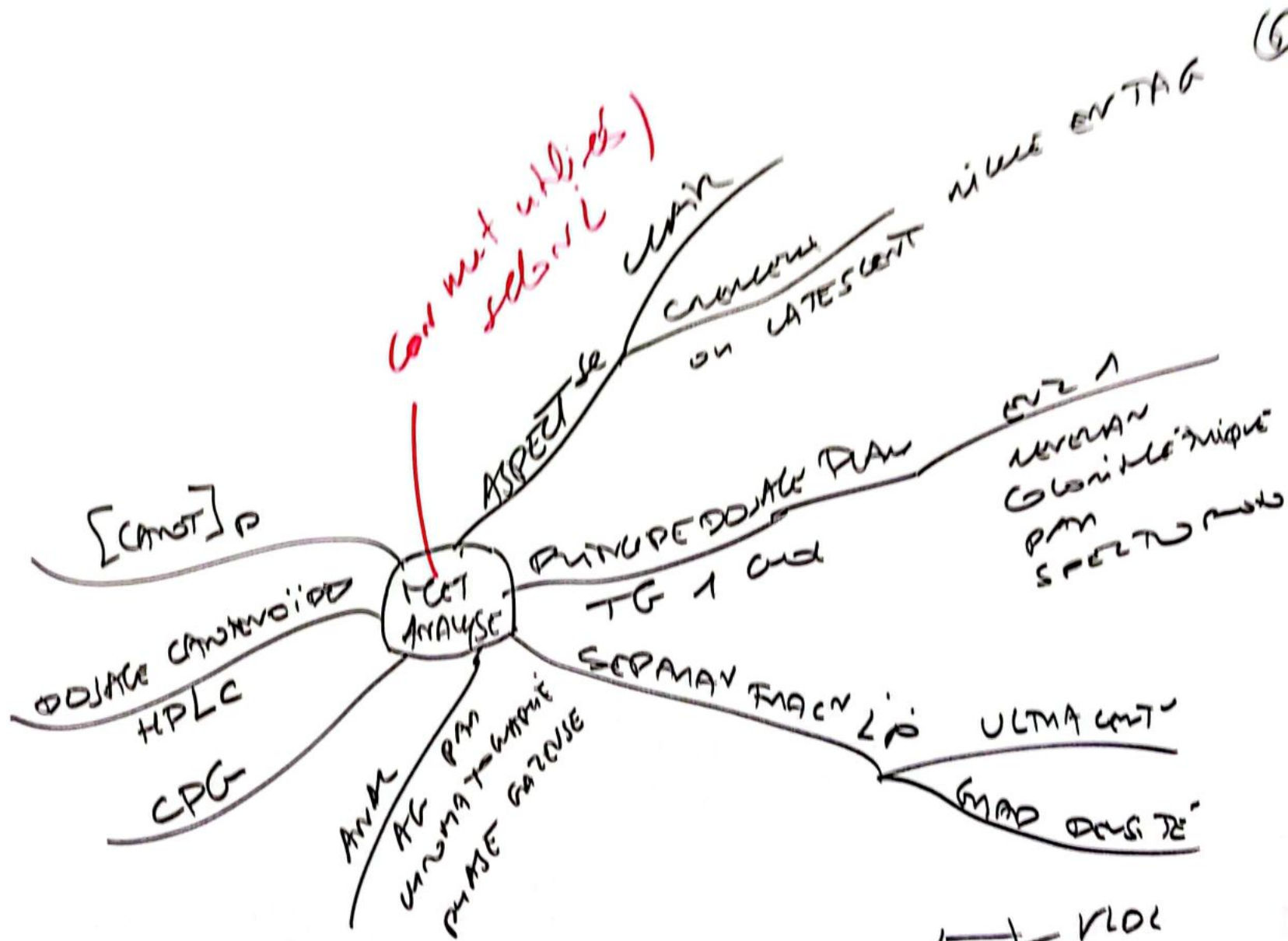


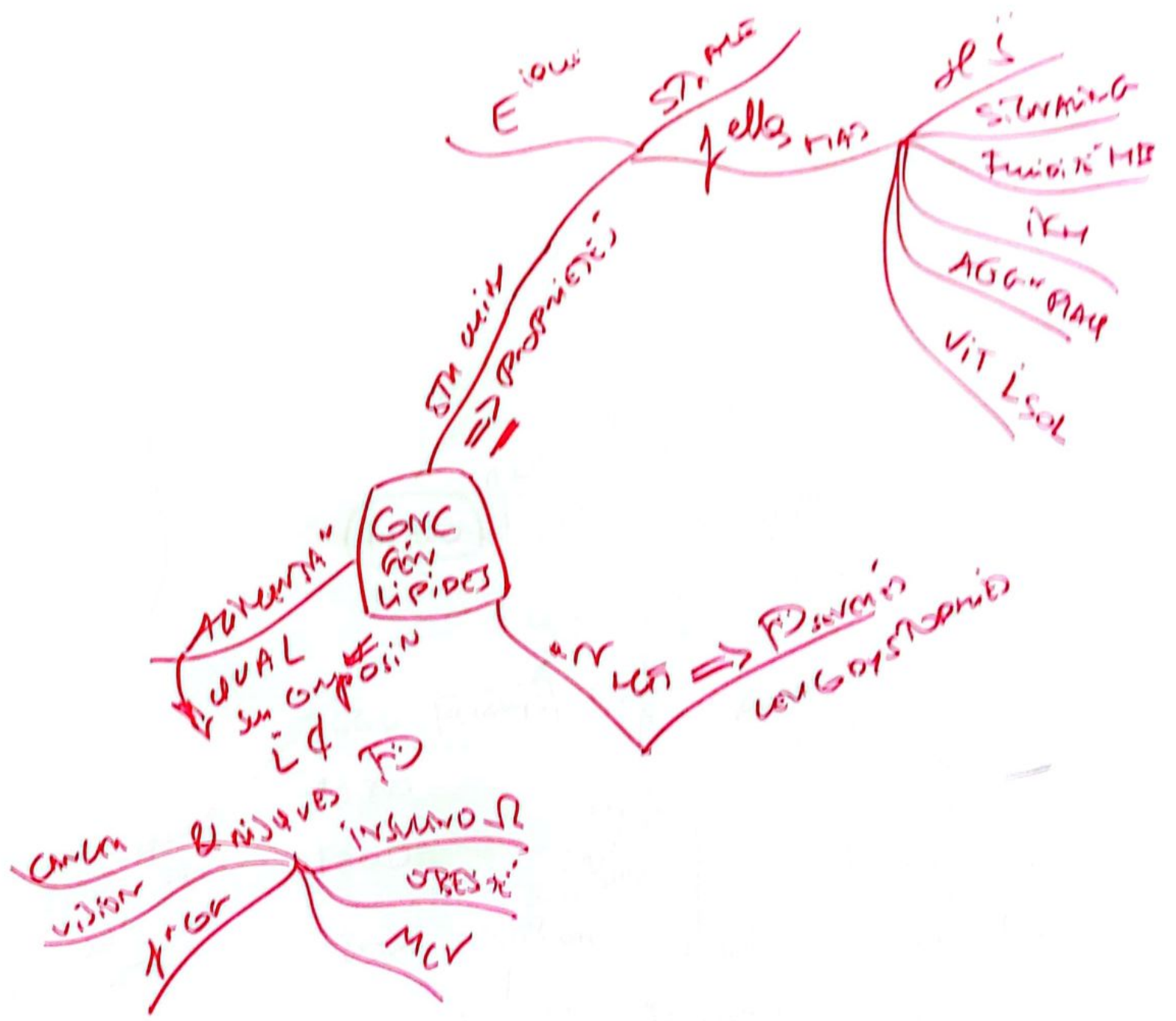
$$\frac{4/1}{3/2}$$

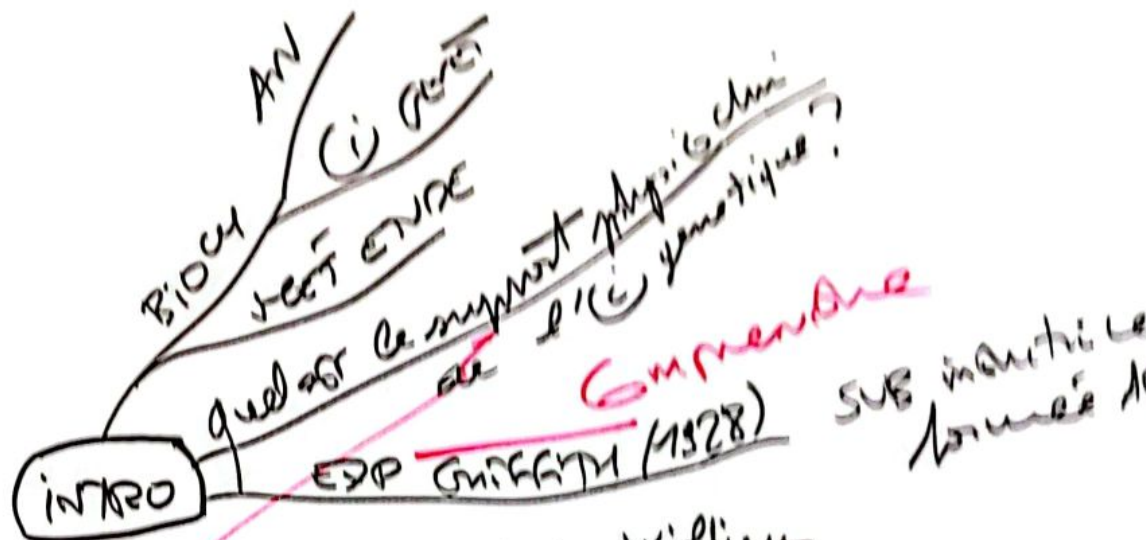
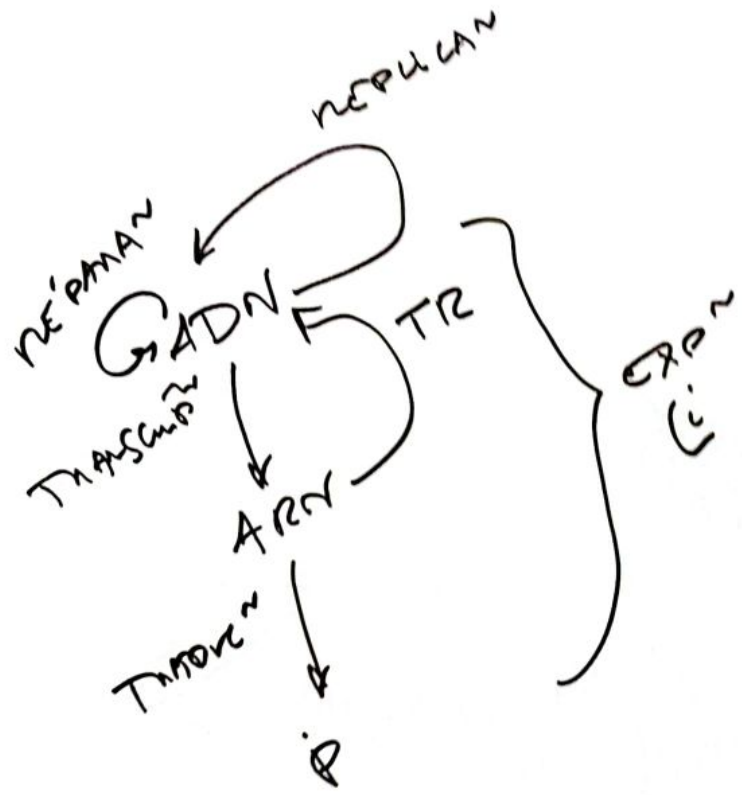
ENDOGENE



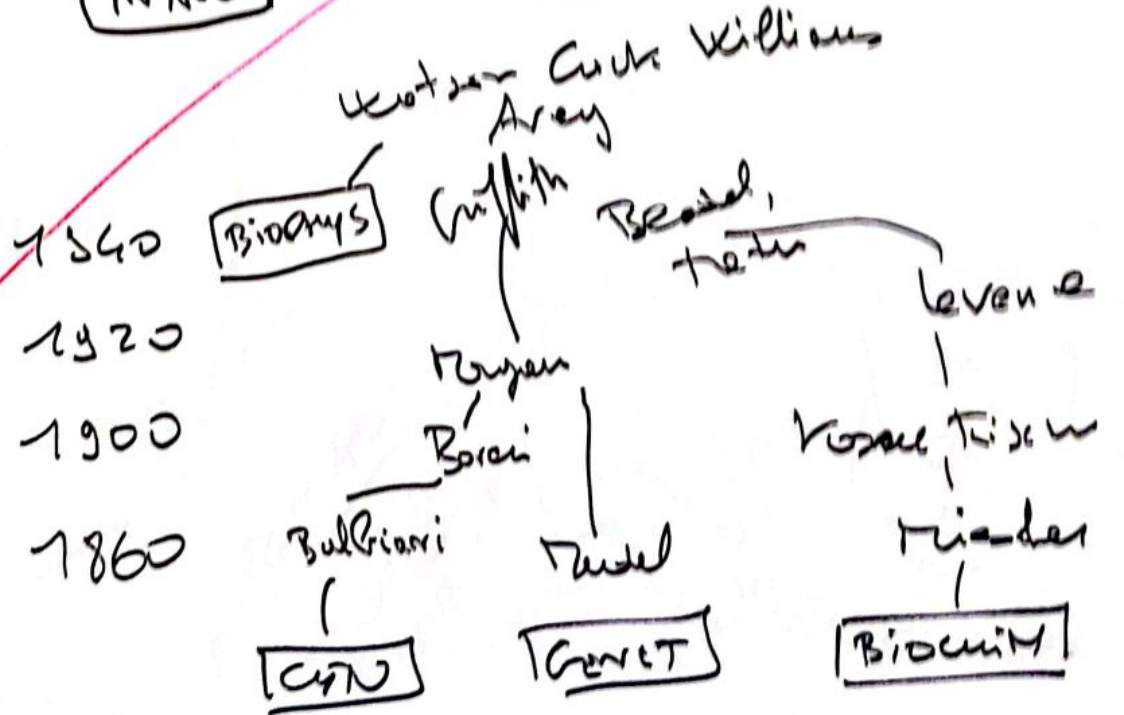






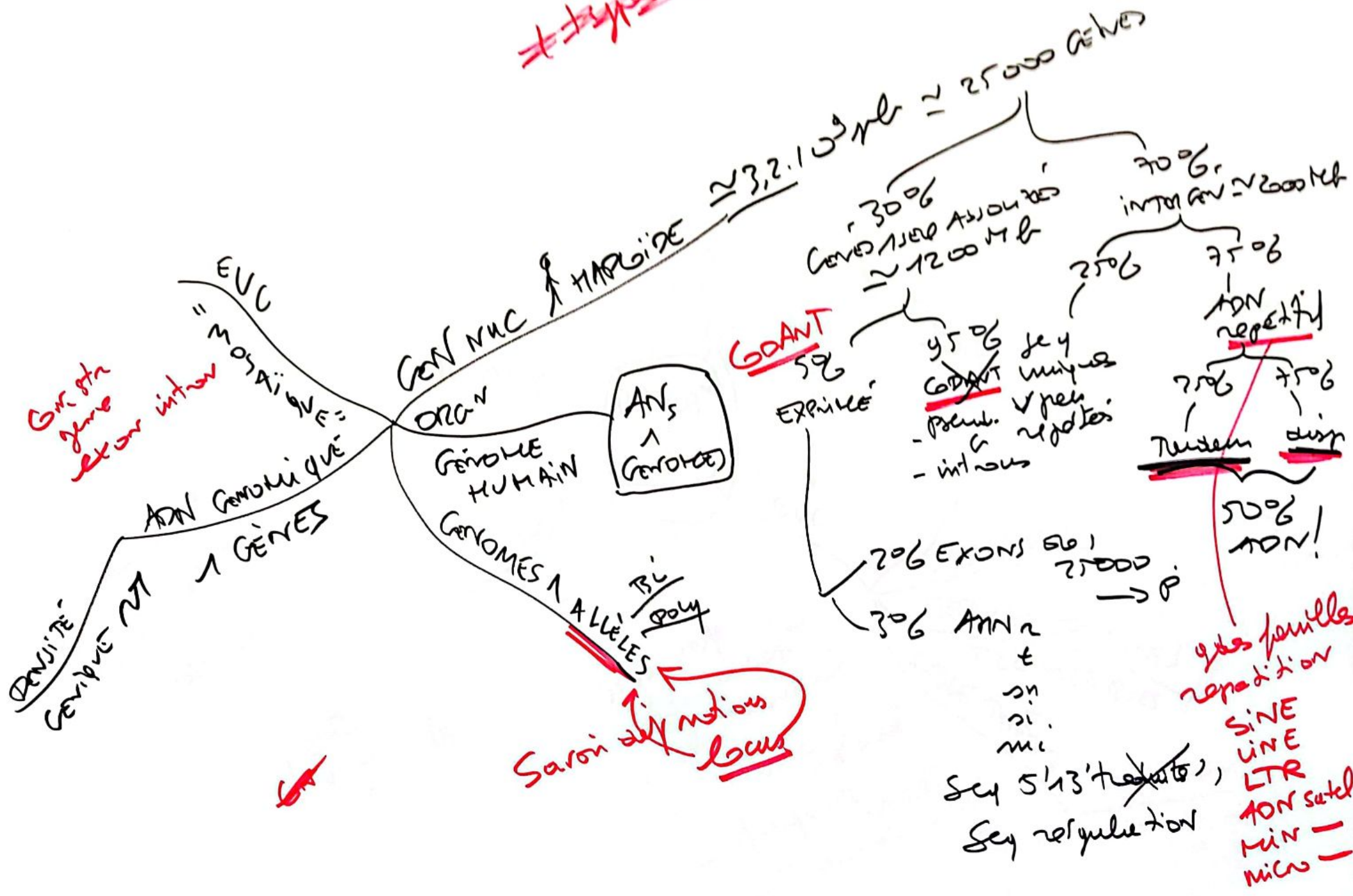


Les étapes de l'ADN

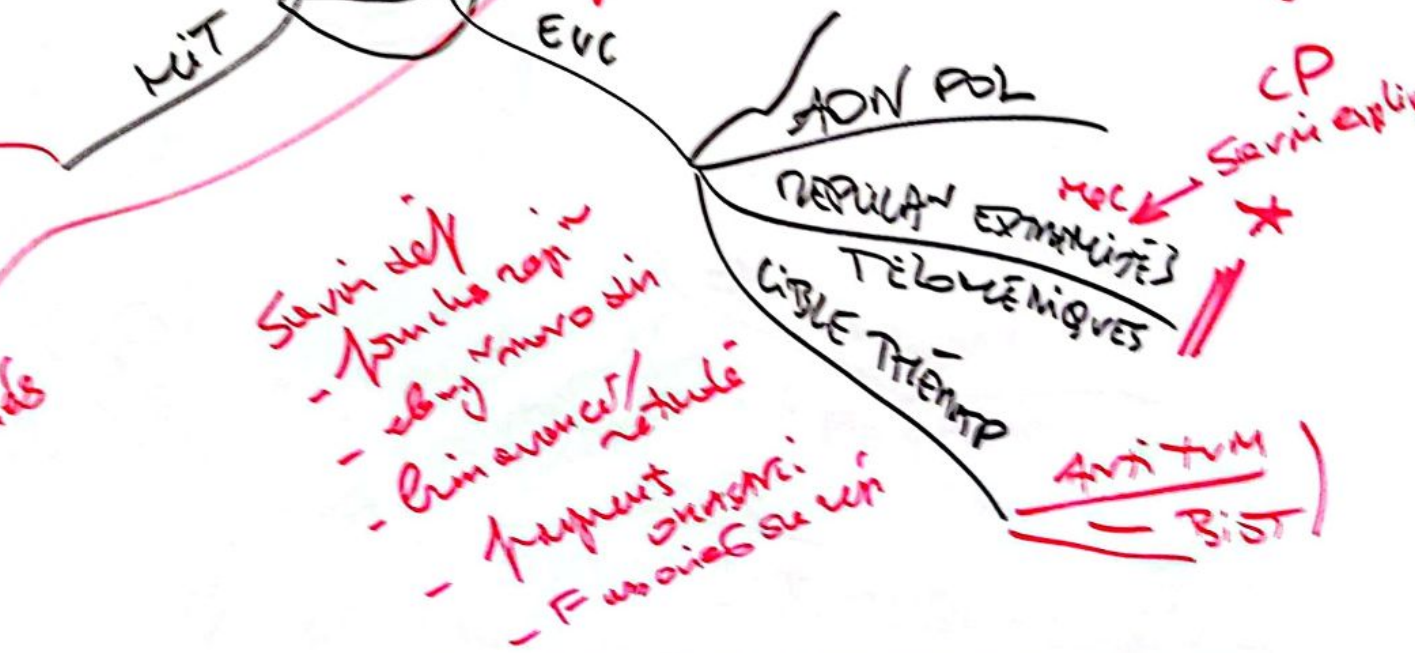
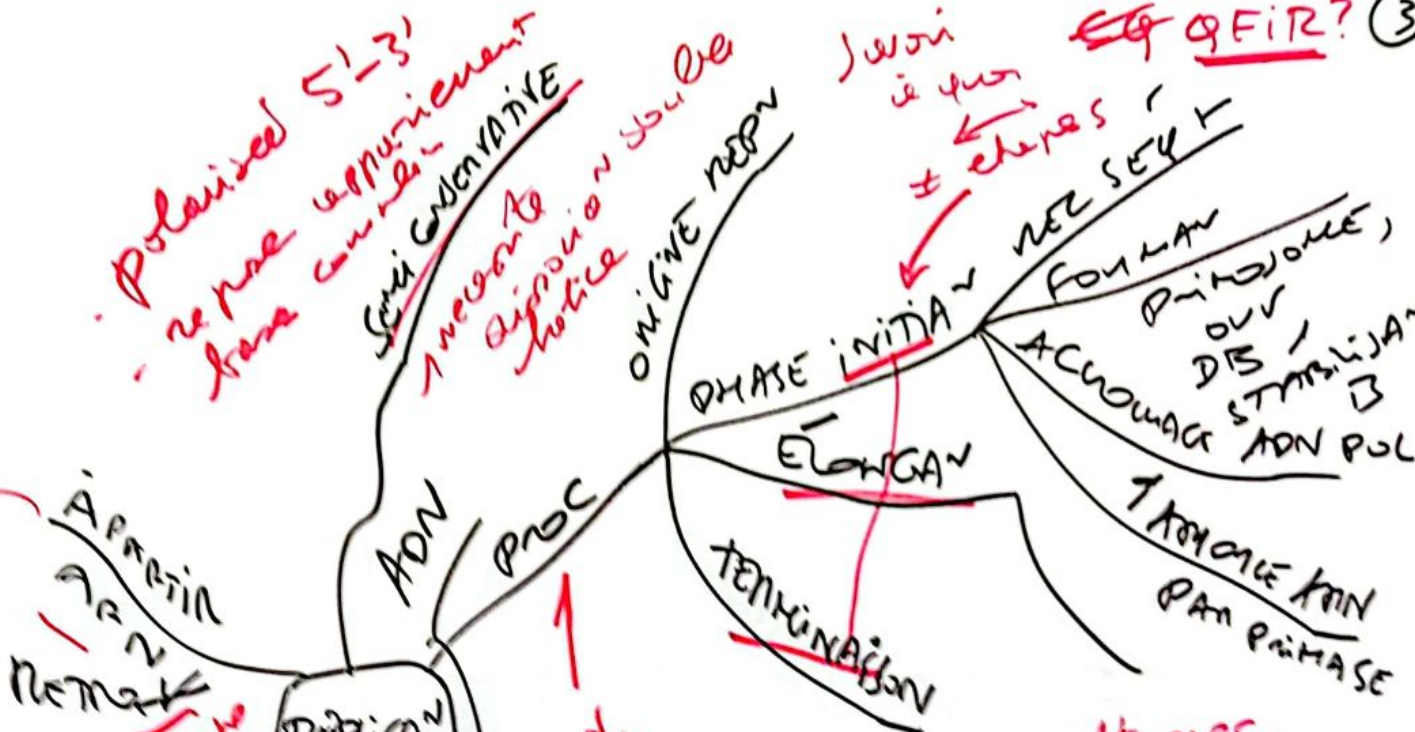


Comprendre
 SUB inductible
 tournée AD

~~Types~~ ~~containing~~ ~~transcript~~



REPLICATION MATERIEL GENET



12T
Seminarij
ochyve

Polarised 5'-3'
re par appurient
base can...
Semi CONSERVATIVE
A new...
disposition you de
notice

Jawab
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+ etapes
QIR? (3)

ADN repl a need
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OR

Seminarij
spoc.

OR
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F...
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Seminarij
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- eby...
- bin...
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- F...

Car elts nec
(matrice, polymere
dy...)

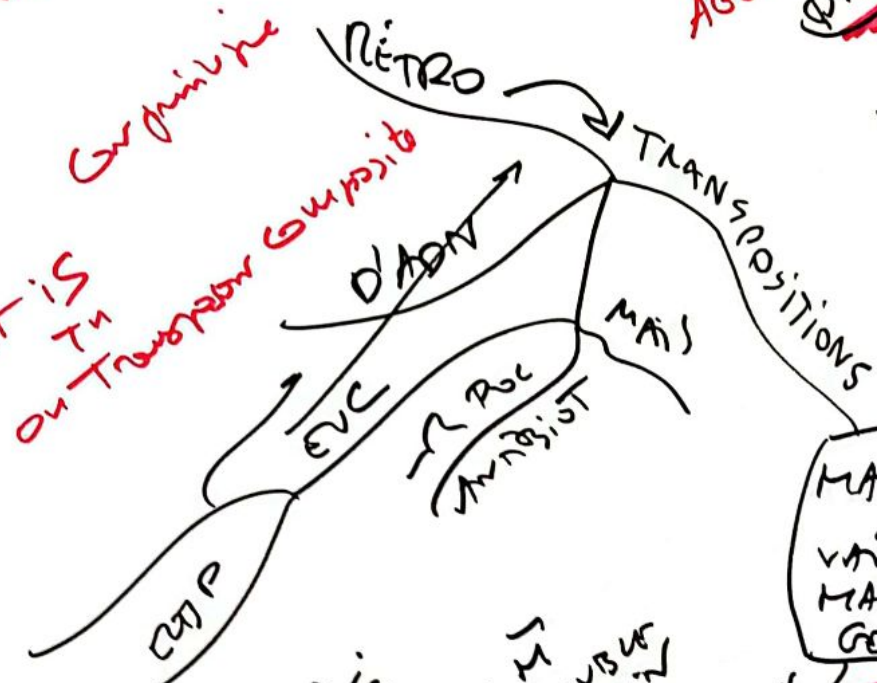
CP
Seminarij

ANTI...
BIST

Structure ≠ replication
Gen priming

ELT IS IN
on Transposon
Composite

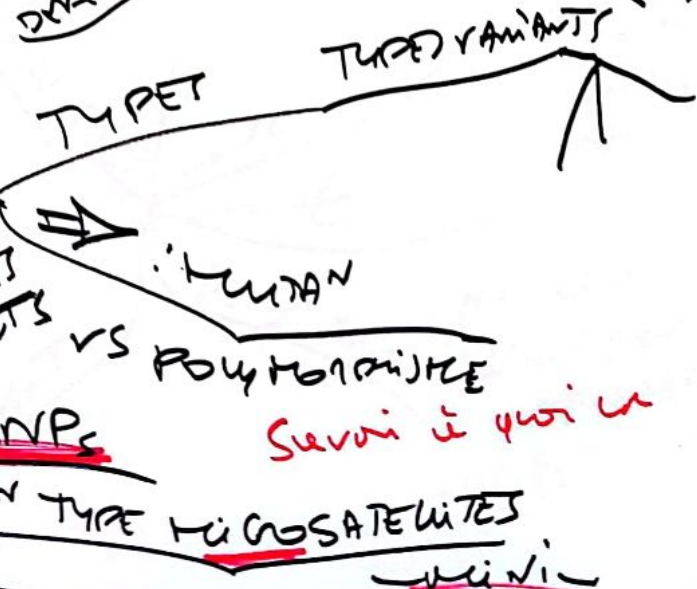
Chim
AGOR
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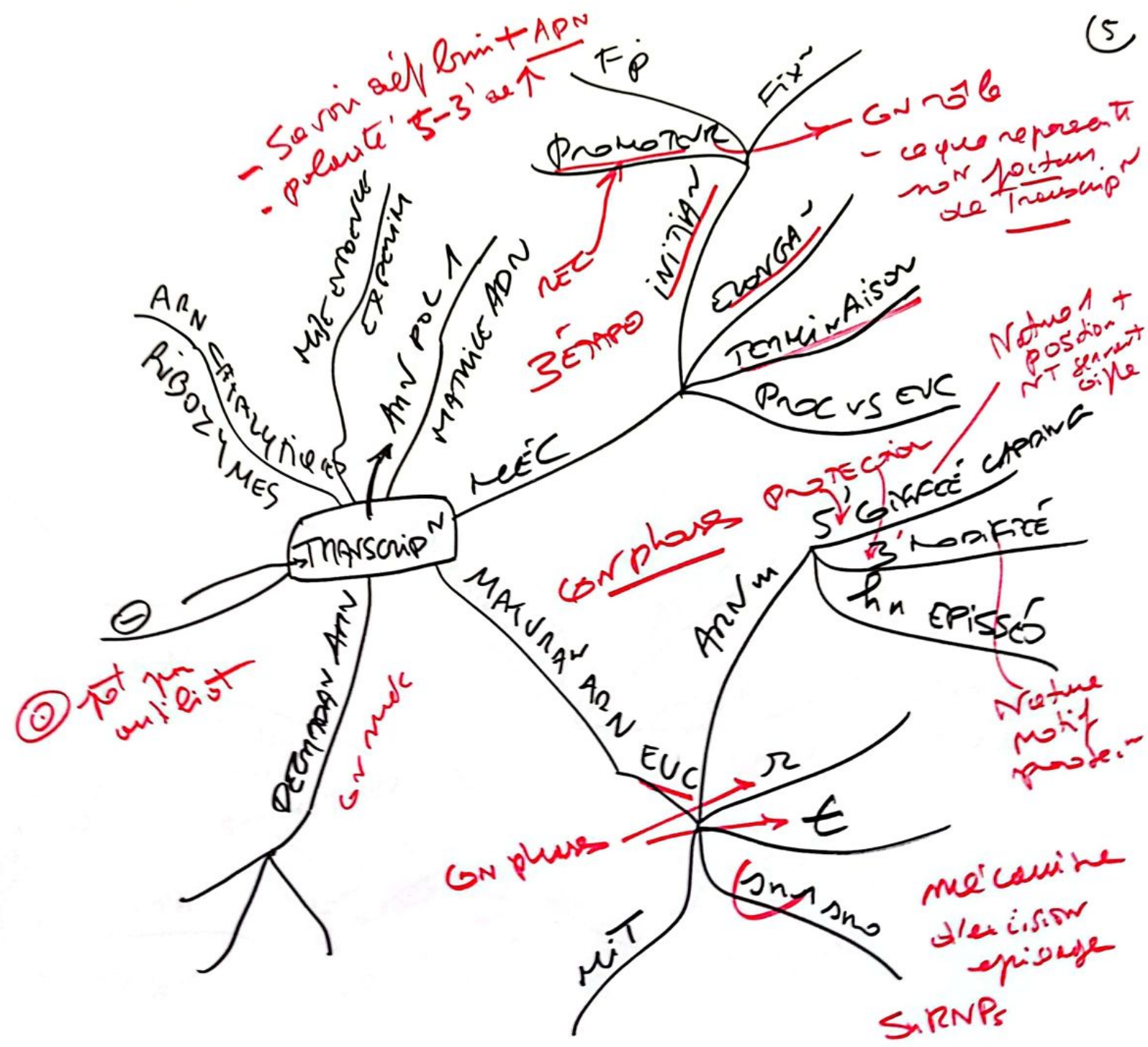


MAINTENANCE & VARIATIONS
MATERIAL
GENET



Gen priming
≠ ref equilibre
homobryne
PRINC
POLYMERISATION
FRÉQUENTS
SNPs
REPETIN TYPE MICROSATELLITES
mini





GDON

GENETIQUES
PROTEIQUES

MISE EN EVIDENCE

CO-TYPES
& ⇒
EVENTUELS

GDON NOM
APPELANT NUCLEOTIDE
500 TRADUCTIONS
1 AA → 1 AA

LAQUE LECTURE

MUTATION
SUBSTITUTION

DERIVINGS

TRADUC

MOLECULES

ARN m

ARN r

ARN t

5TH
FONCTIONS

PER GDON
VS AA

GDON CAN

ETS qui dej
le GDON
ARN m AA
PER le AA

GDON ≠ PHASES
NATURE 1 interven
≠ molec Etypes

GDON
STOP avec
peptide du signal
ni de l'acide
peptide du signal

GDON
princ
etaps
1 3 5 7 9 0

ANTIBIOT
TOXINES

CO-TRANSCRIPTION
PAN INSERTION

↑ P & S MITOC

↑ P: POLY UBS
ANTICIPATION

GDON EVENTUELS

PER ↑ P & S
NIBOSOME

AA PAN

MINO AYL
ARN t
SYNTHETASES

INITIAN

ÉLONGAN

recherche
TERMINATION

Souvi
ce que
c'est

A quel etape
intra se situe
m F

