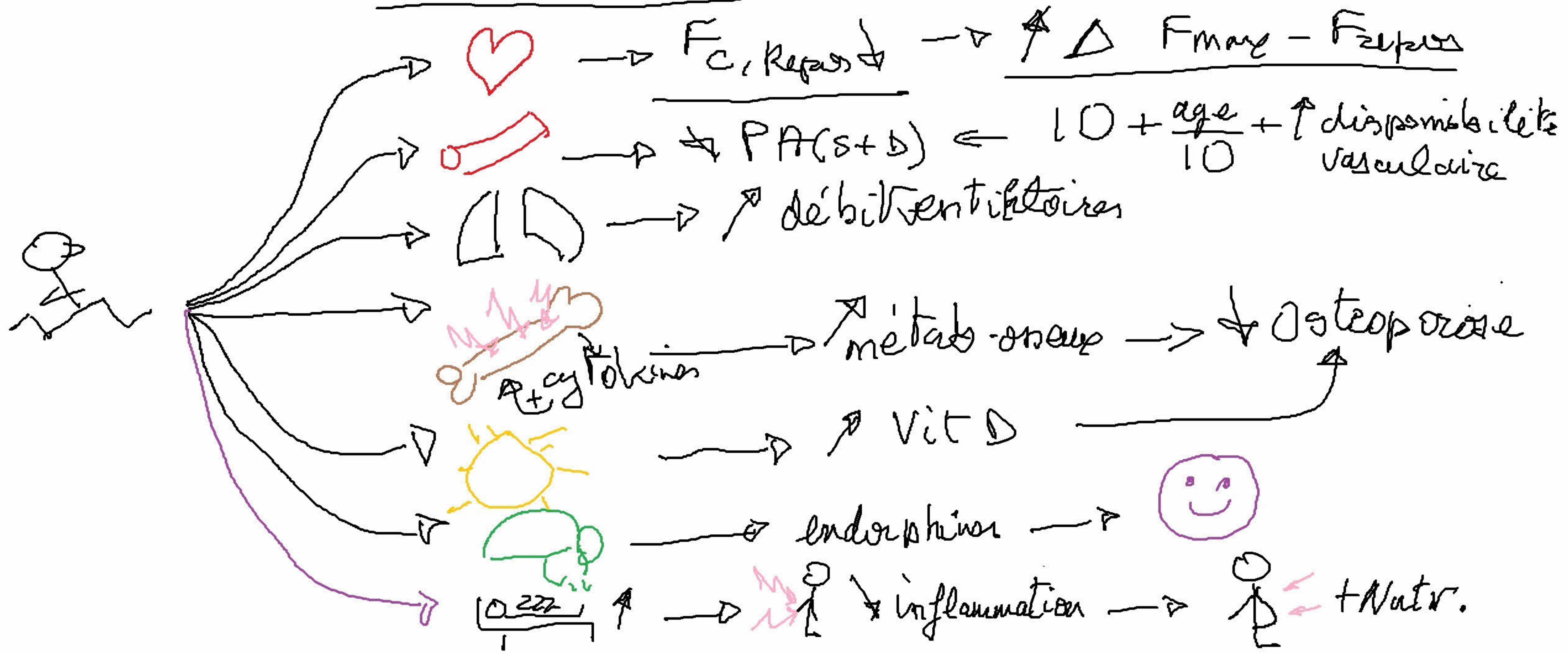

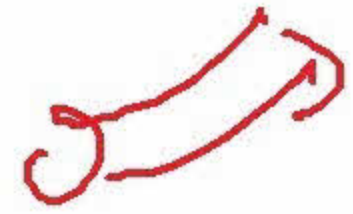



V: bénéfices du sport

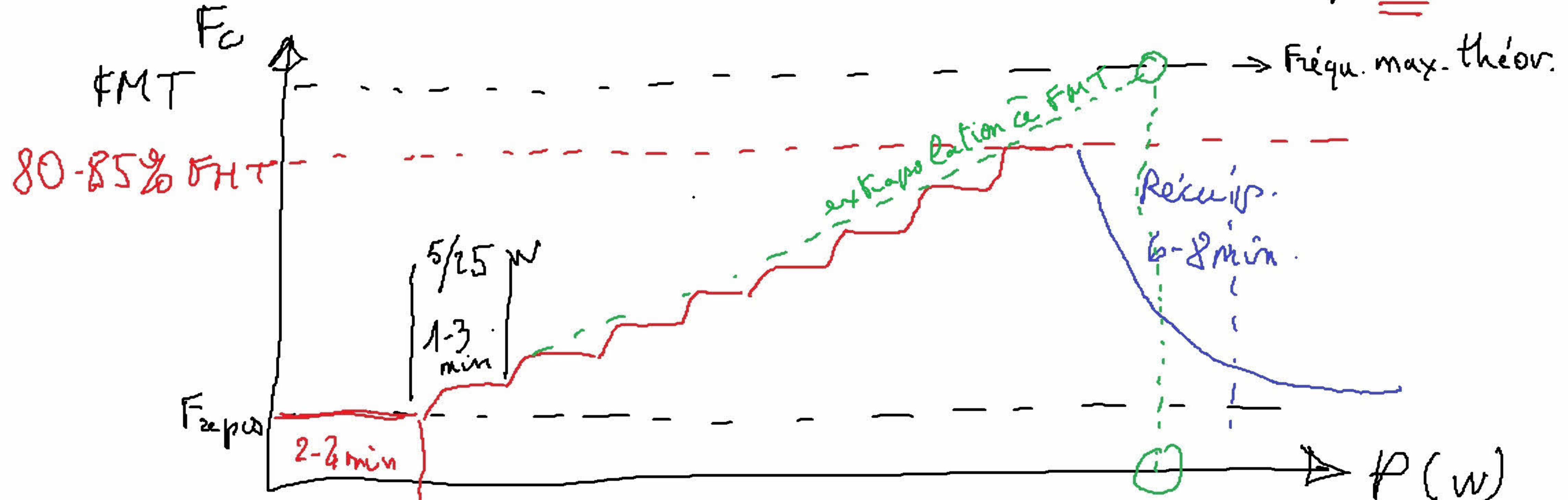


I - Données mesurées

-  → ECG → FC \dashrightarrow $FMT = 220 - \text{age}$
fréquence maximale théorique
-  → PAS → $10 + \frac{\text{age}}{10}$
PA D → $\frac{PAS}{2} + 1$
-  → $\dot{V}O_2 \text{ max}$
→ $\dot{V}O_2 \text{ pulm.} + \text{débit ventric.} \rightarrow$ Explor. Funct. Resp.
- Fib I \Rightarrow Fib II \rightarrow Biopsie

D = 8-15 min

III: Epreuve effort: $\dot{V}O_2 \text{ max}$ — indirecte
 — s/s maximale



$\dot{V}O_2 \text{ max} = \left(\frac{PMT \times 0,01}{\text{e/min}} \right) + 0,4$

$P_{\text{max Théorique}} = \underline{PMT}$

ent 3 air^t : ↑ 20% $\dot{V}O_2 \text{ max}$

IV; domaines de travail

o VMA: vitesse maximale aérobie : D max. en 6 min.

$$VMA = D \times 10$$

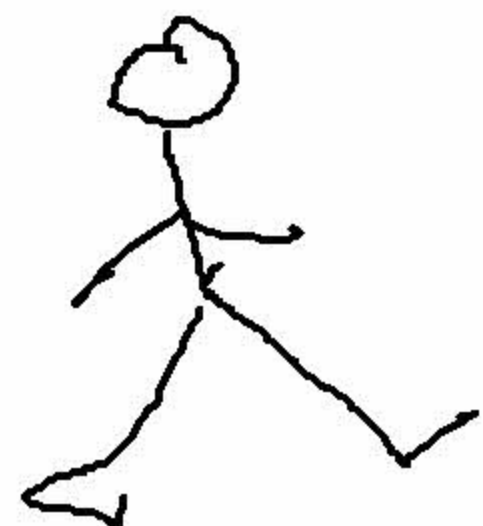
o $\dot{V}O_2 \text{ max} = \left(0,18 \times VMA \times \frac{100}{6} \right) \pm 5 \text{ ml/min/kg.}$

o PMA : $(\dot{V}O_2 \text{ max} - 0,4) / 0,01 \text{ l/min}$

o seuil anaérobie $\geq \frac{80-85\%}{\dot{V}O_2 \text{ max}} = \underline{\underline{7 \text{ min}}}$

VI. Recommandations

mini



30 min marche
Rapide / j

podomètre
léger essouffement

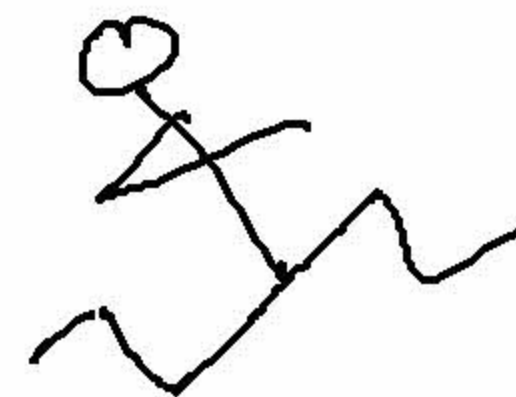
moyenne



45 min / j

cardiofréquence mètre

intense



≥ 45 min

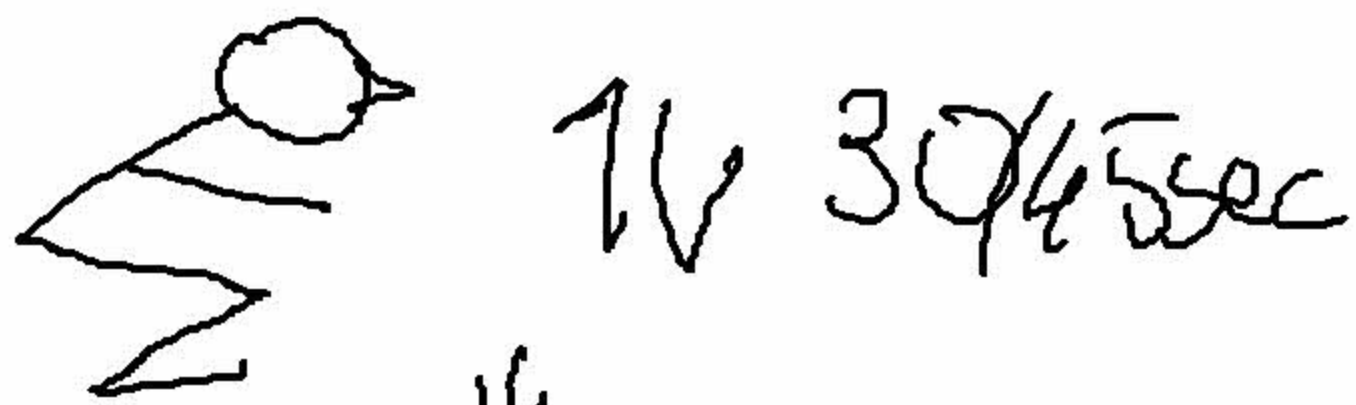
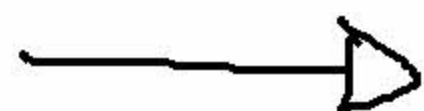
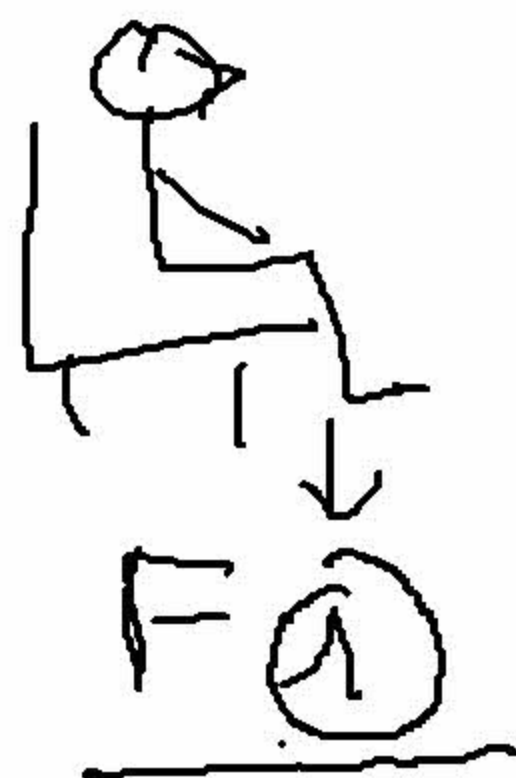
80-85% FMT

cardiofréq + Coach

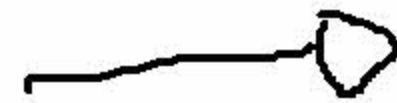
- o échauffement
- o essouffement
- o fractionné

Pazoles

II. Test de Ruffier



F2

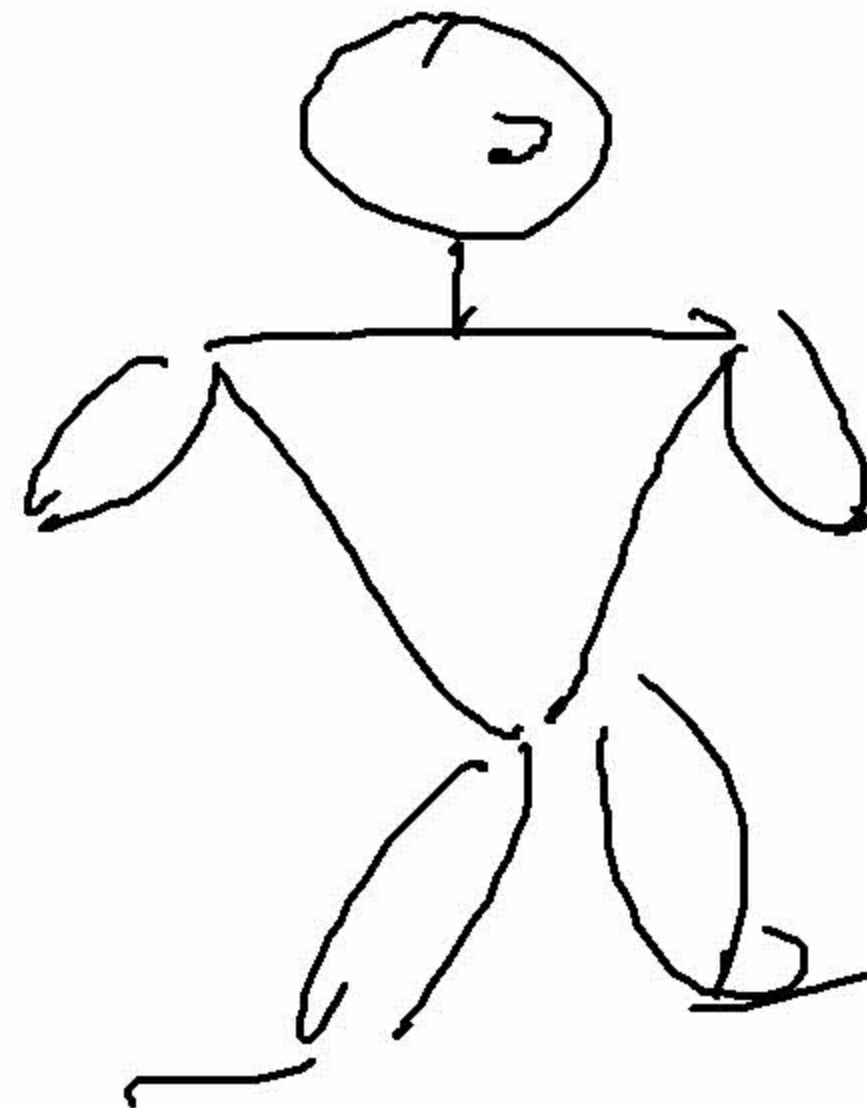
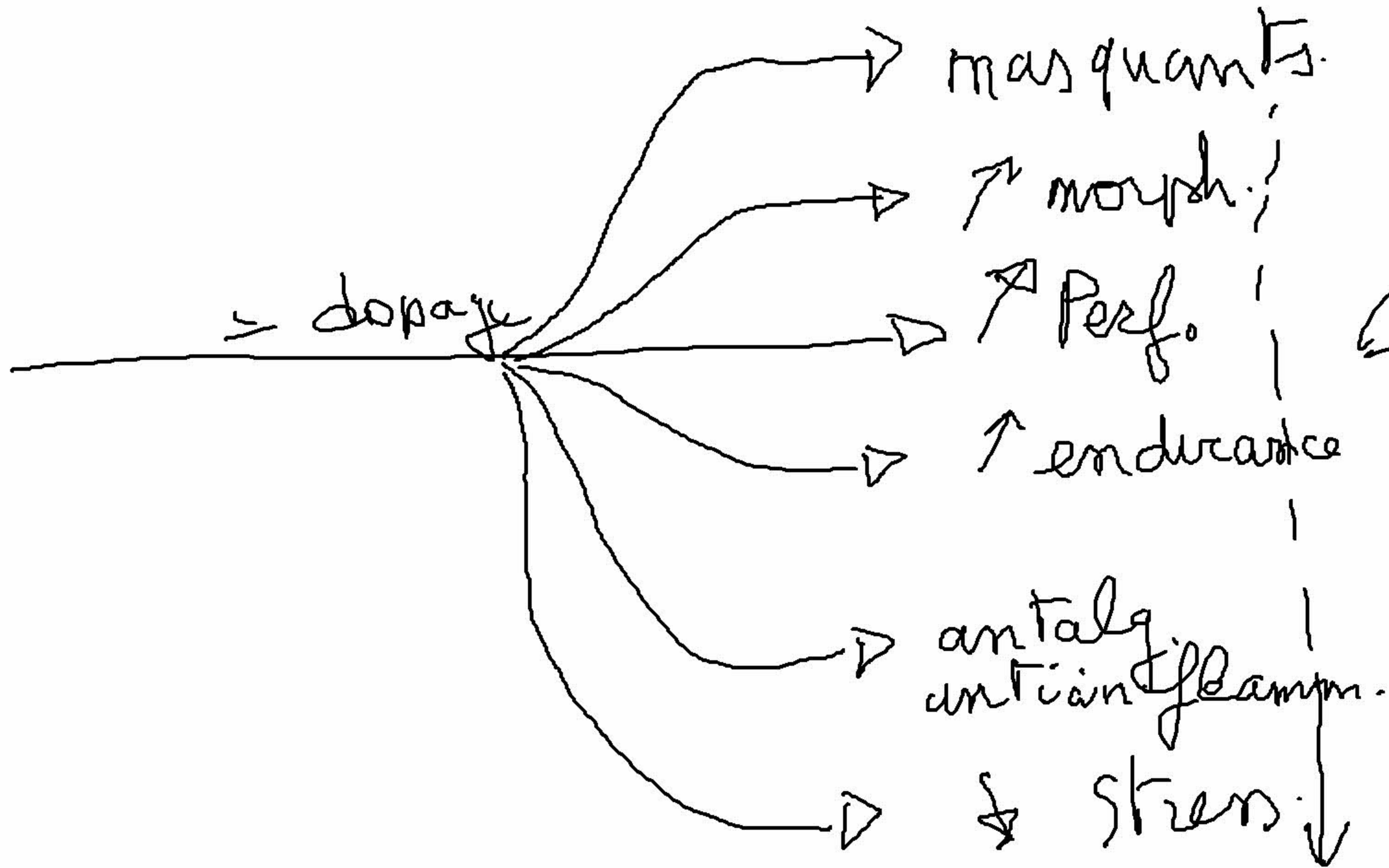
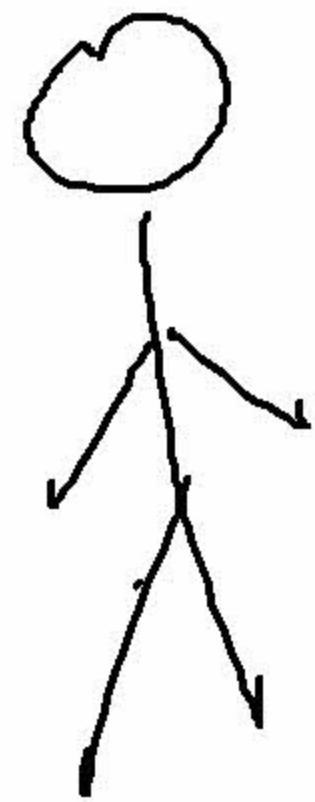


Indice de Ruffier (iR)
iR ← en train

$$= \frac{(F_1 + F_2 + F_3) - 200}{10}$$

- 0 : accept
- 1-5 : TB
- 5-10 : m
- 10-15 : insuff.
- > 15 : consulte

I: definition & Buts



+

"Affaires"

3000^t - ginseng China II - Histoire du Doper ya

2700 → alcool

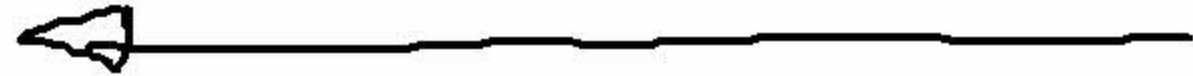
2500 → viandes

2400 → hydromel (gras), sauge (Rome)

XIX → cannabis → haschich.

XIX → coca

1896



éphédrine

1950

→ amphétamines



1960

→ stéroïdes

1967 Simpson

"RDA"

1970

→ EPO

1996 F. Griffith

1980

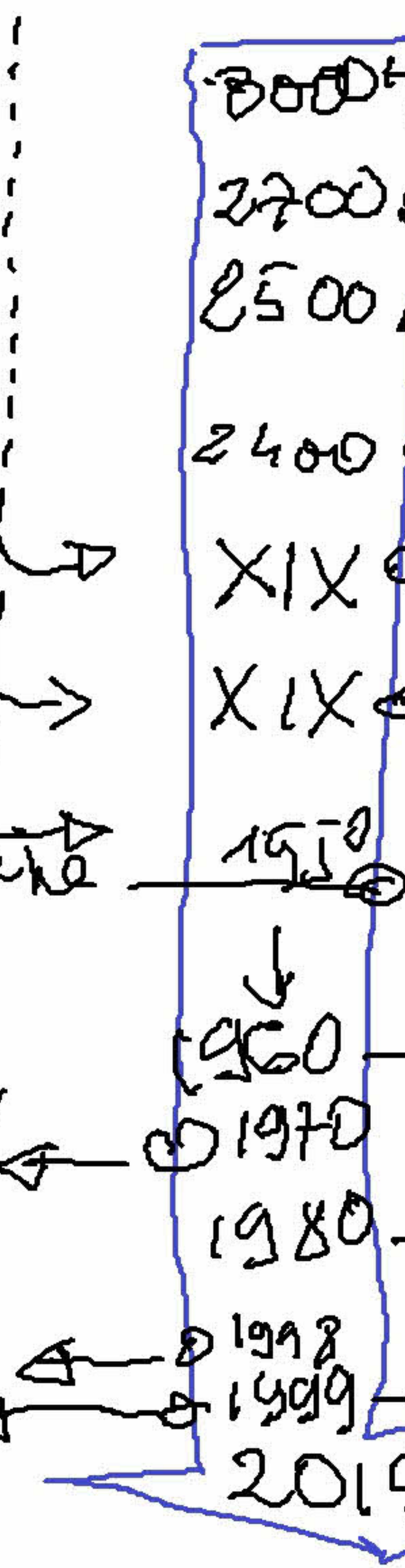
Festina

1998

1999 - 2005

Armstrong

2015



III - Classification Substances interdites

① Enq. mas compét

a) Substances : S1 à S5

- anabolisants
- hormones
- masquants.

b) Méthodes : M1 à M3

- transferts D₂
- manip. génétiques.

② En Compét.

Subst. : S6 à S9

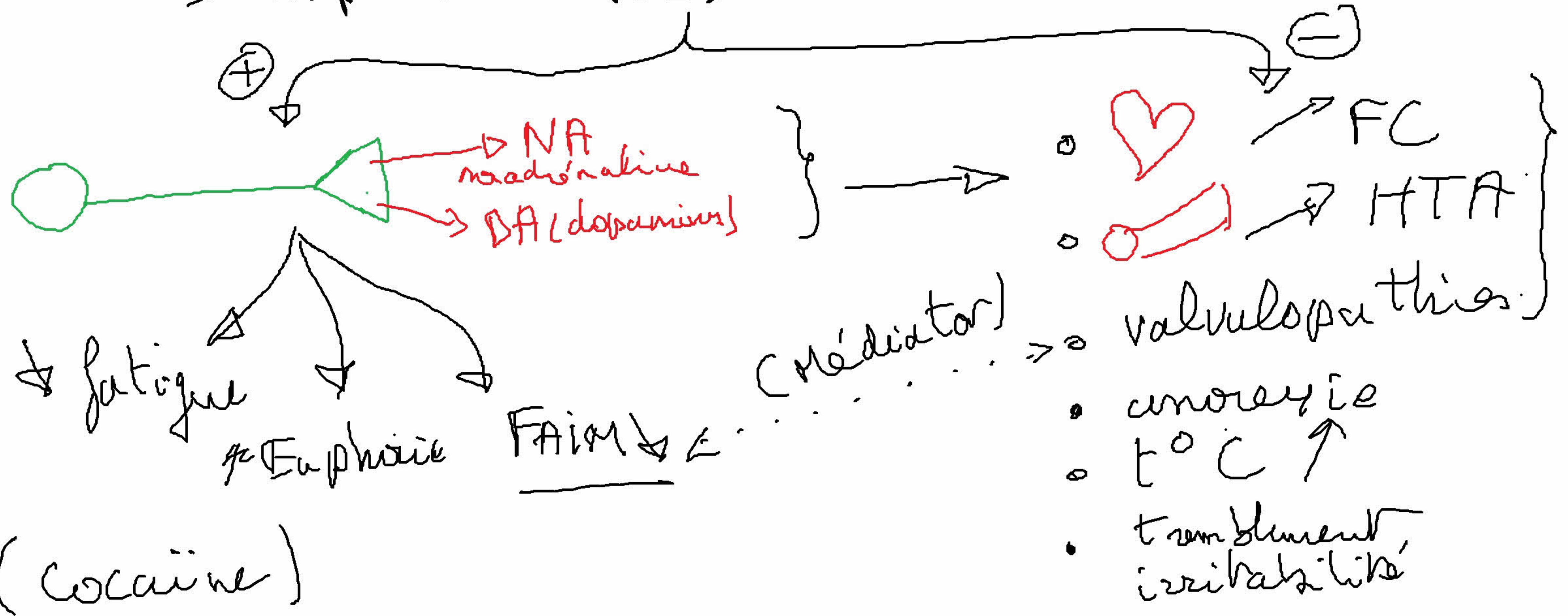
- stimulants
- narcotiques
- cannabis
- corticoïdes

③ Certains Sports.

- alcool
- β -bloquants

④ Autres ...

IV Amphetamines (SB)



V : Adolescents (S1) : Testosterone

(+)

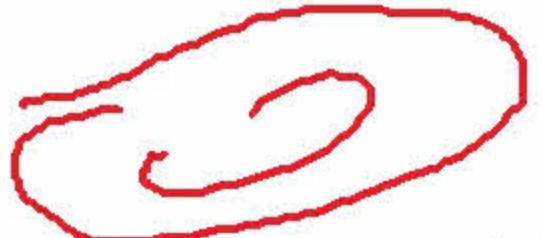

(-)

o ↑ Proteinia

↓

o Force ↑

o ↑ endurance

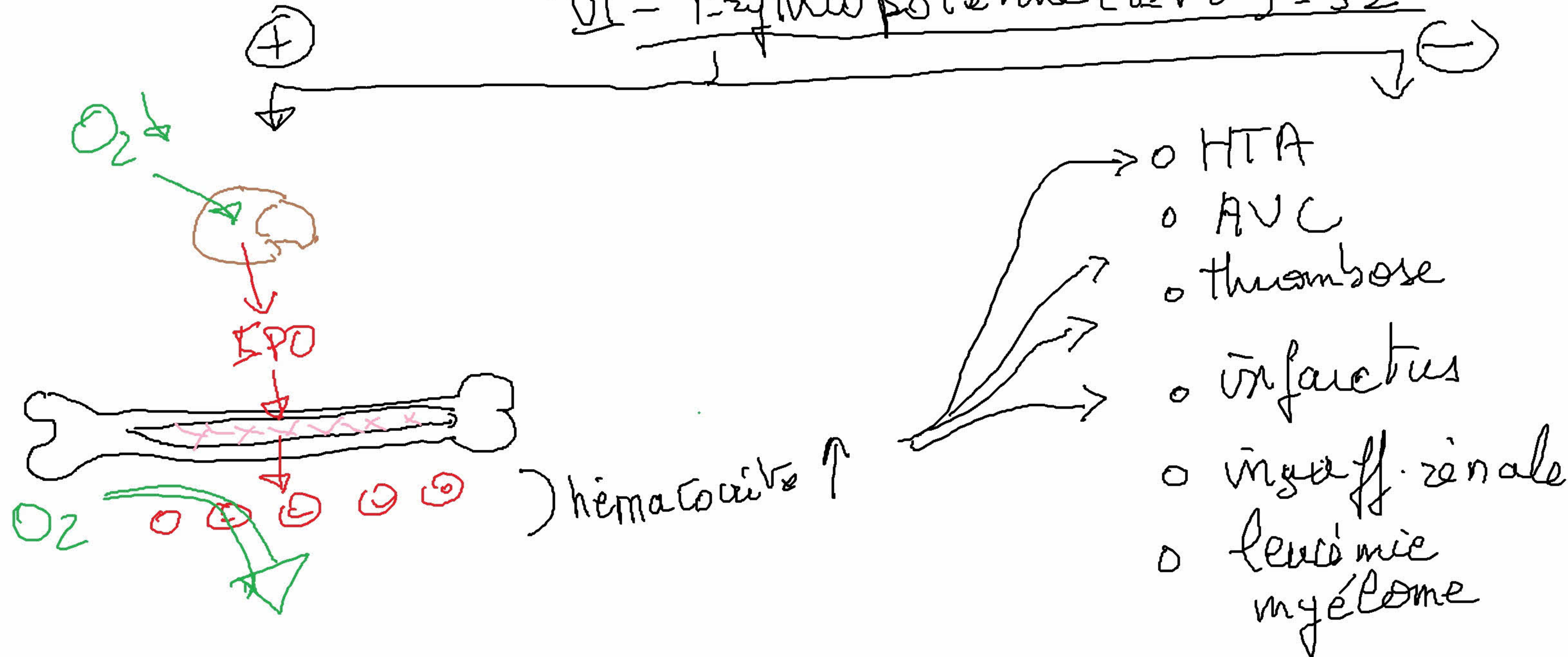
o ↑  + 



- o Hormone de A (S2) + acromégalie
- o Insulin like growth factor (IGF)

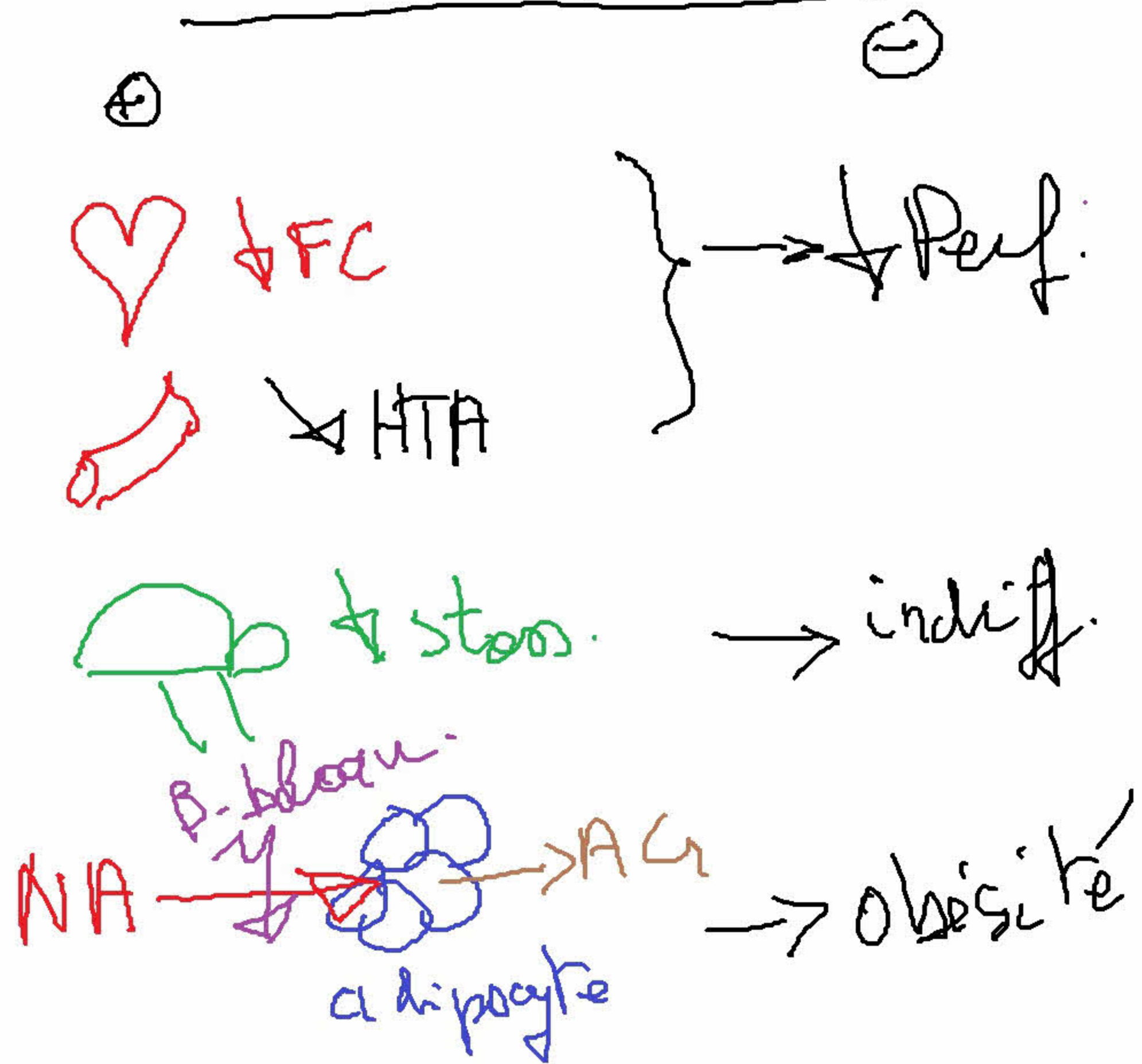
- o Acné
- o alopecie
- o cloquage
- o rupture tendons
- o ↓ croissance
- o impuissance
- o pb psy
- o KC Foie
- o HTA + AVC

VI - Erythropoietine (EPO) - S2

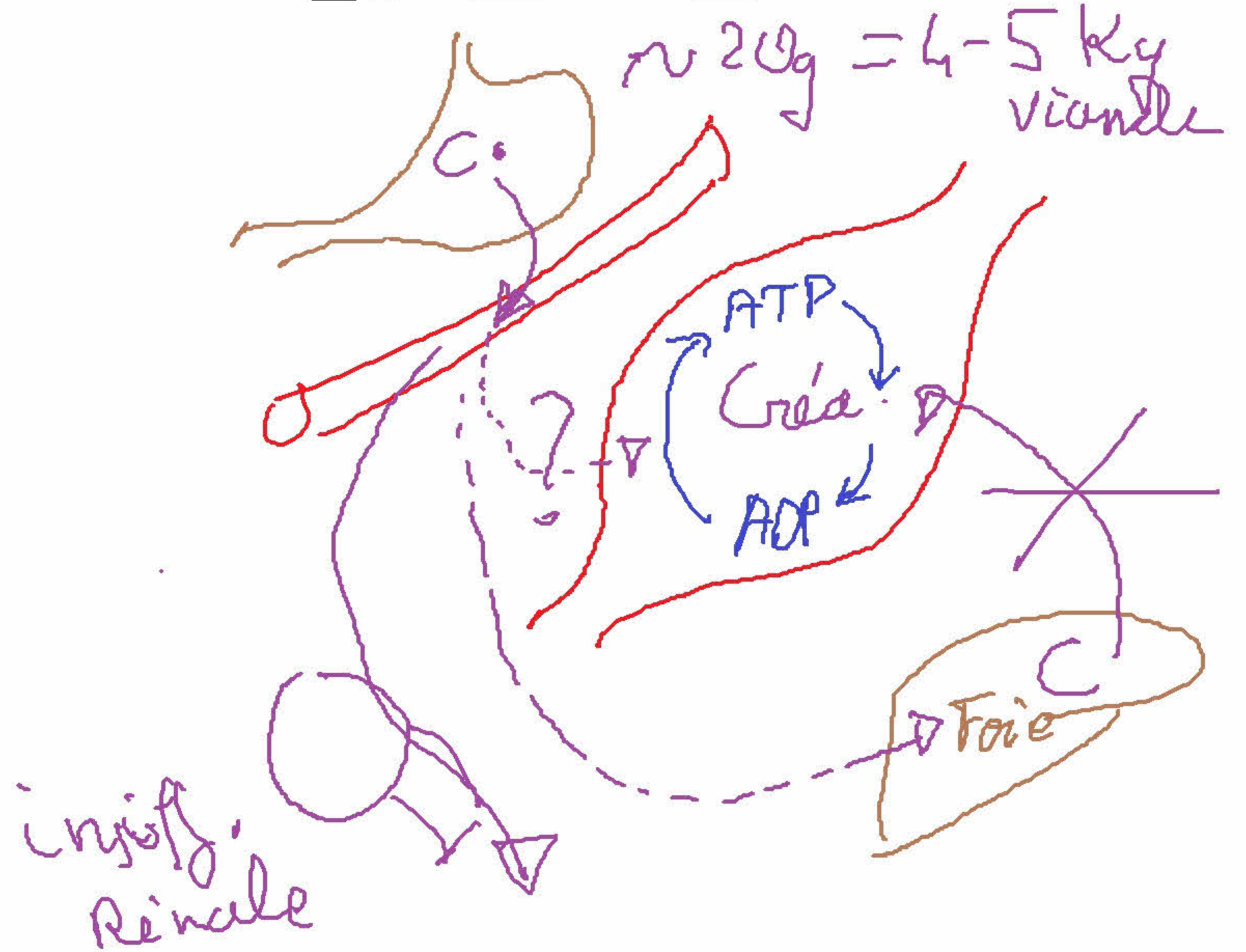


VII. Autres

β - bloquants



creatine



VIII Addiction au sport.

