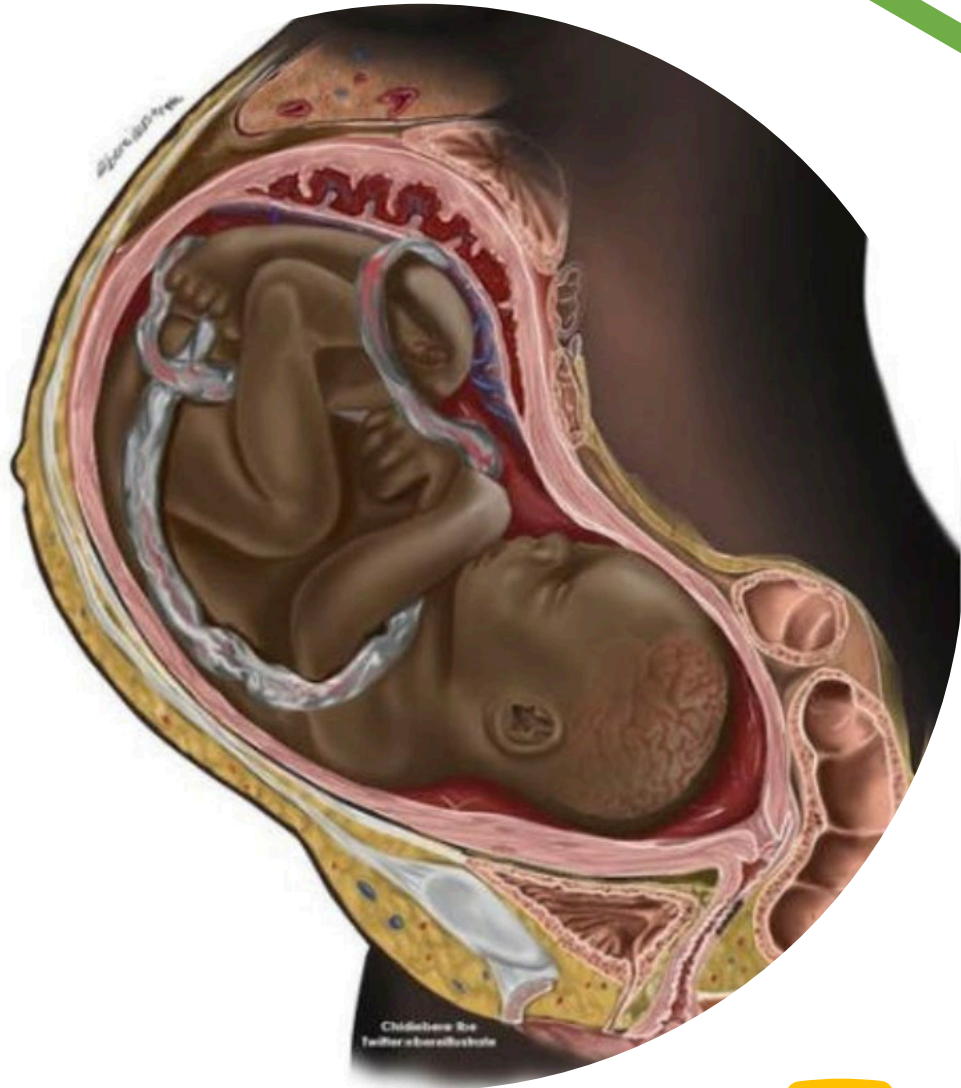




ASCAT
Annual Academy For
Sickle Cell And
Thalassaemia
Conference



SCD and pregnancy

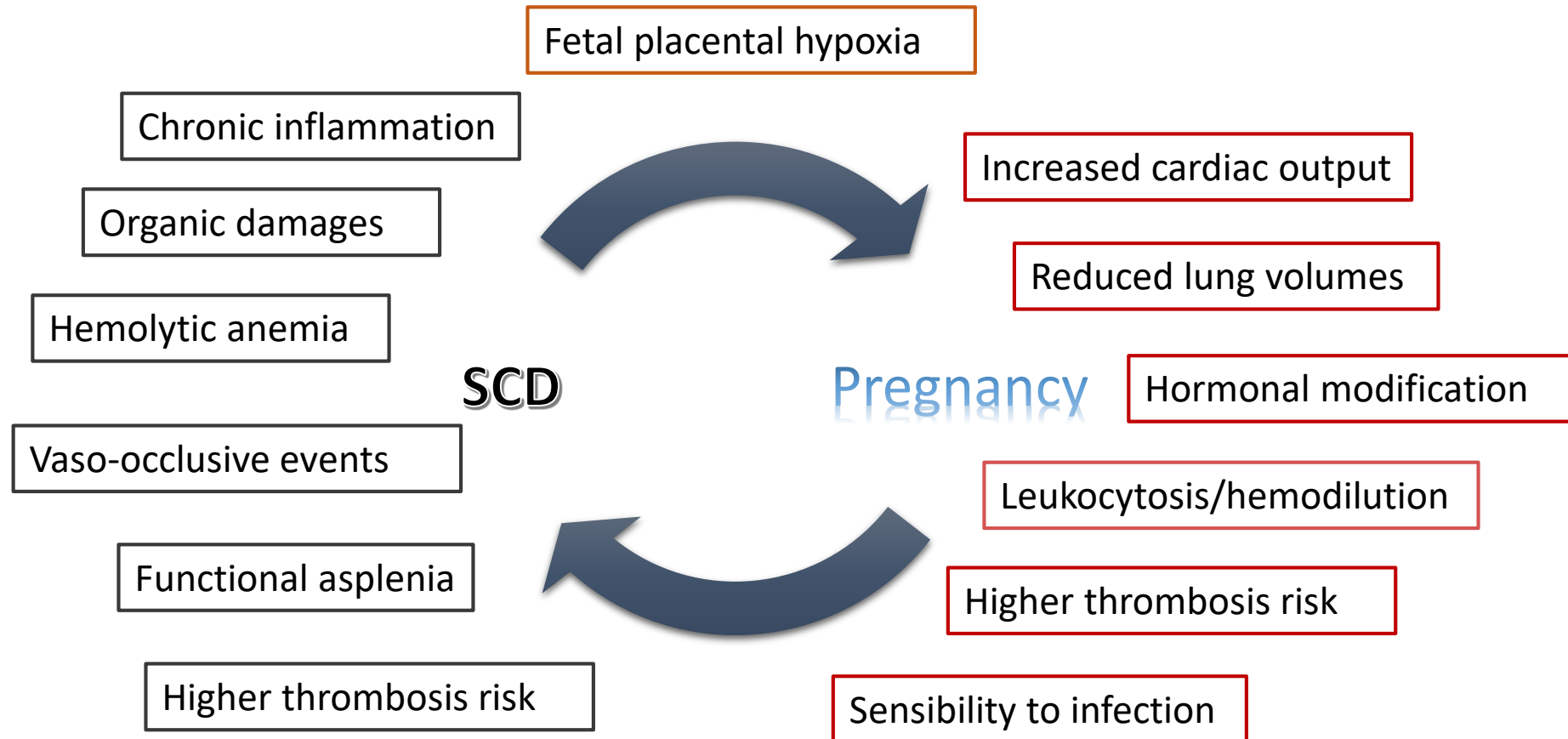
French experience

Dr Laure Joseph MD

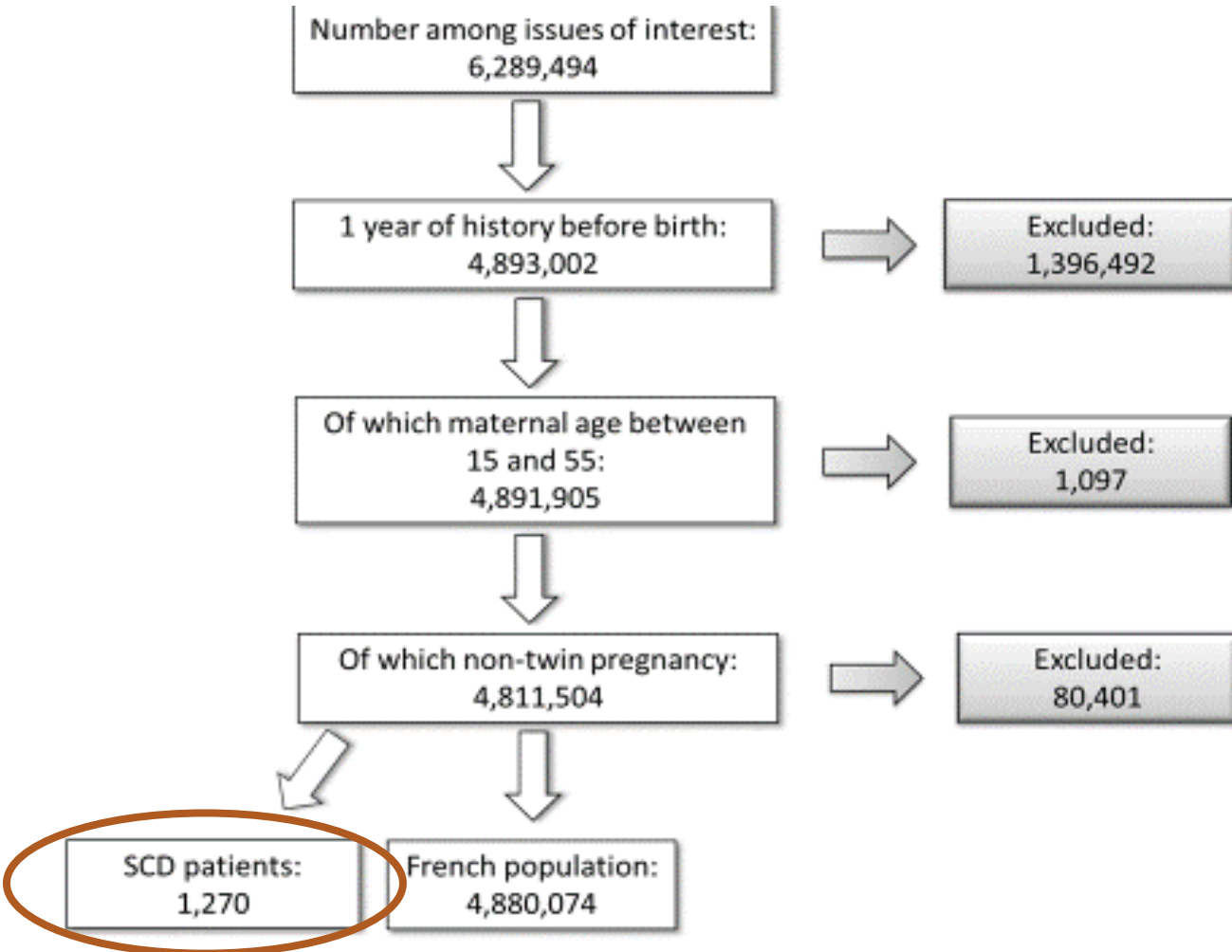
Necker-Enfants-Malades Hospital

@eberillustrate

Sickle Cell Disease worsens pregnancy and pregnancy worsens Sickle Cell Disease



French National Health Data (2013-2019) (unpublished data)



- No code for genotypes
- We separated SCD into 2 groups
 - Severe SCD: Hydroxyurea (HU) treated or/and transfusion program (TP) in year preceding pregnancy
 - Mild SCD : others
- Including overseas departments

Population characteristics

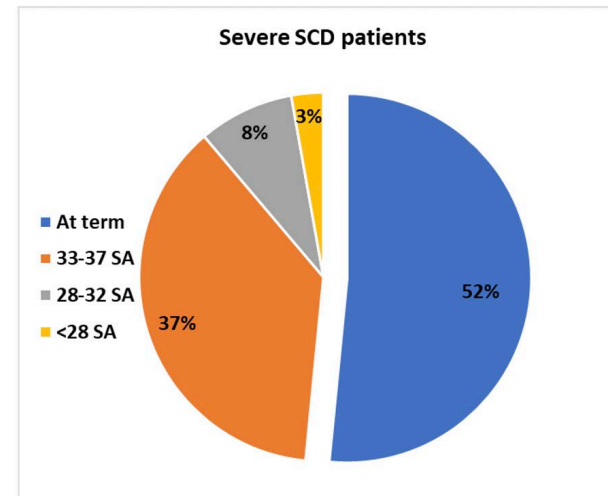
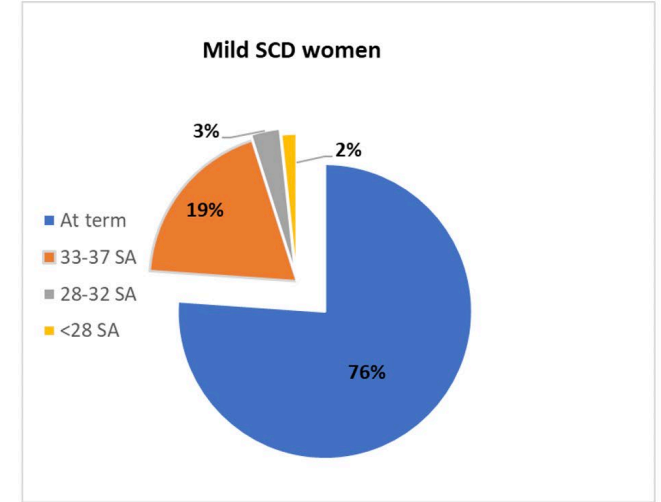
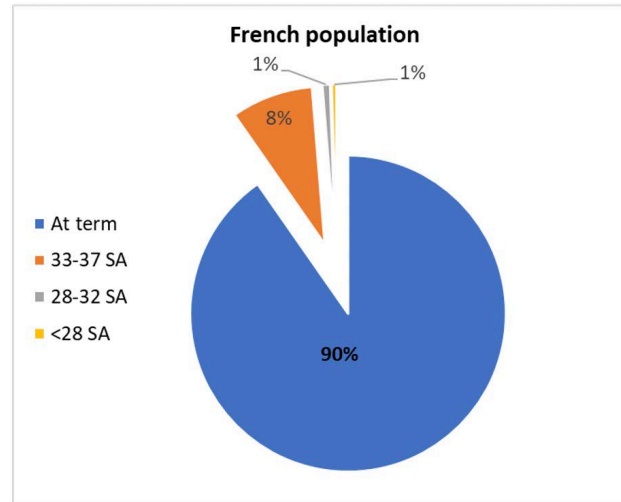
	French population	SCD patients	p value (FP)	Mild SCD patients	p value (FP)	Severe SCD patients	p value (FP)
Total	4800074	1270		879		391	
<u>Maternal age, mean standard deviation</u>	30.26 +/- 5.39	29.51 +/- 5.25	< 10⁻³	29.67 +/- 5.33	0.001	29.15 +/- 5.06	0.08
<u>Diabetes history [n (%)]</u>	22746 (0.47)	37 (2.91)	< 10⁻³	27 (3.03)	< 10⁻³	10 (2.46)	0.7
<u>HTA history [n (%)]</u>	46304 (0.96)	65 (5.12)	< 10⁻³	34 (3.87)	< 10⁻³	31 (7.93)	0.003
<u>HIV history [n (%)]</u>	4442 (0.09)	21 (1.65)	< 10⁻³	17 (1.93)	< 10⁻³	4 (1.02)	0.32
<u>Use of assisted medical procreation, [n (%)]</u>	87626 (1.83)	9 (0.71)	0.001	8 (0.91)	0.004	1 (0.26)	0.34

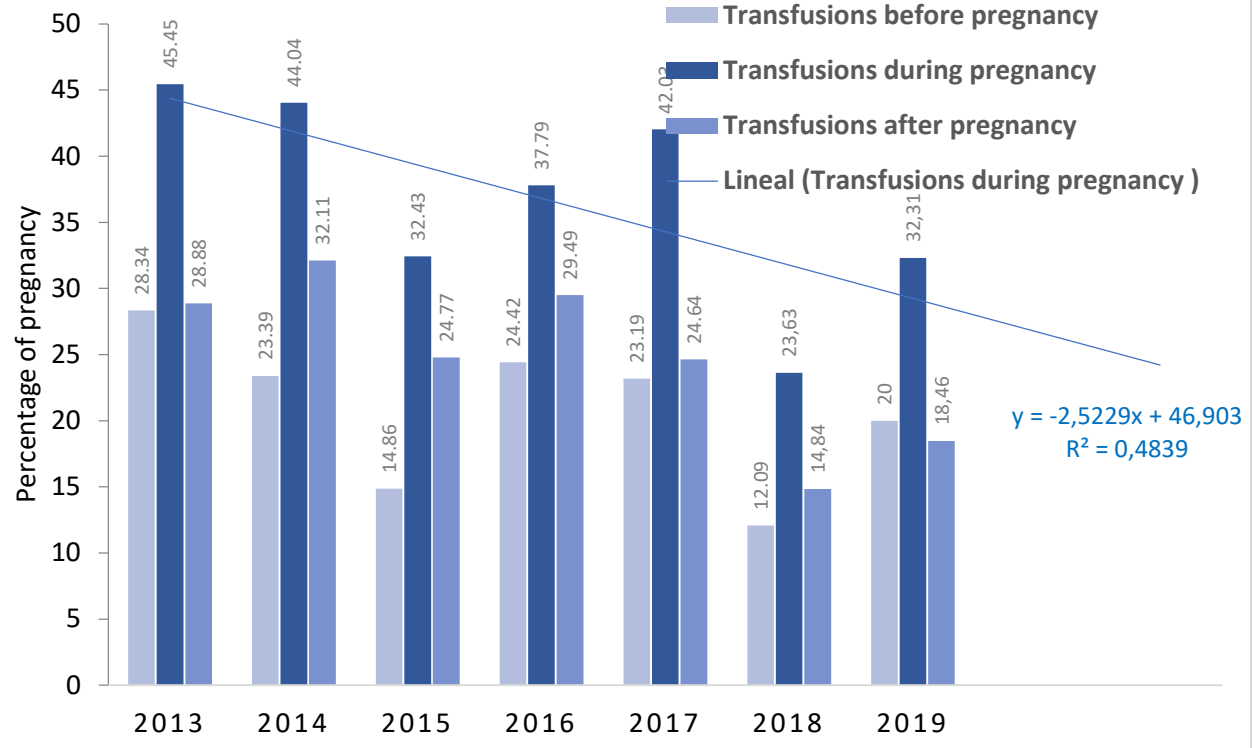
Key points

- More obstetrics complications in SCD vs french population
 - Even in mild SCD compared to control
 - Increased risk of pre eclampsia in severe SCD (11.51%) vs mild (5.23%)
 - Majority of ceasarean delivery 58% in severe SCD (vs 35.3% in mild)
- More maternal complications in SCD vs french population : genito-urinary infections, venous thromboembolism (mild SCD) and pulmonary embolism (severe SCD))
- Preterm new borns+++ in SCD with double risk in severe disease (51.82%)



Distribution of full-term and preterm newborns. In the French population, in mild SCD women and in severe SCD women





What about transfusion?



Management of pregnant SCD women

Preconception
consultation

PREGNANCY
Monthly medical and
obstetric consultation
(2nd and 3rd trimester)

POST-PARTUM
Follow up W6, M3, M6



Pregnancy possible for SCD patients!

Improvement in care but still significant maternal-fetal risk

Need of specific multidisciplinary management