

Incidence of Kidney Parenchyma Cancer in France in 2000: Study based on seven cancer registry cases

Arlette Danzon, Carole Langlois, Pascale Grosclaude,
Michel Velten, Brigitte Trétarre, Florence Molinié, Elvira
Martin, Patricia Delafosse, Marc Colonna

French Cancer Registries Network
FRANCIM

With the support of Pfizer

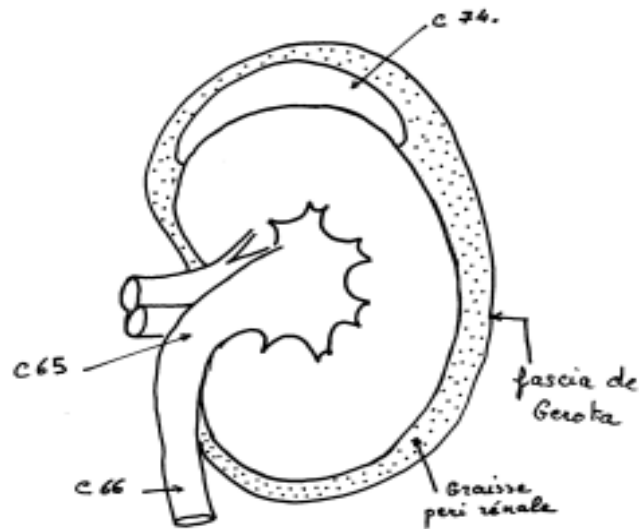


Context of the study

- ★ Collaboration between the French Cancer Registries Network (FRANCIM) and and Pfizer Global Pharmaceutical
- ★ to determine the number of metastatic kidney parenchyma cancers
- ★ to identify the target population of a new multi targeted treatment



Kidney cancer registration



- ★ Statistics on « kidney cancer » usually include **cancer of parenchyma (C64.9)**, pelvis (C65.9), ureter (C66.9) and other and unspecified urinary organs including urethra (C68.0) (usually originating from transitional epithelium)

Objectives

- ★ To measure incidence of kidney parenchyma cancer by sex, age and TNM stage at diagnosis
- ★ To measure proportion of cancers with metastases at diagnosis
- ➔ for epidemiological surveillance
- ➔ for evaluation of patients care.



Methods (1)

- ★ Cases diagnosed in 2000, using seven French registries
- ★ Selection criteria based on kidney cancer subsite « 64.9 »
- ★ Data collection
 - identification information: sex, date of birth
 - information on tumour: date of diagnosis, most valid basis of diagnosis, morphology, investigations to determine tumour extension, TNM clinical and pathological according to fifth edition
 - Information on evolution data



Methods (2)

- ★ Data were collected by registry investigators from clinical files.
- ★ Metastases were considered as initial when occurring within 6 months after date of diagnosis.
- ★ TNM stage was determined from T, N and M variables using a method to minimize unknown stages.
- ★ Incidence rates were standardized using world population reference.
- ★ Distributions were compared with Chi2 test.



Methods (3): TNM stage

- ★ Stage 1: T1 N0 M0
- ★ Stage 2: T1 N0 M0
- ★ Stage 3: T3 N0 M0
- ★ T1, T2, T3 N1M0
- ★ Stage 4: T4 N0 N1 M0
- T (any) N2 M0
- T (any) N (any) M1

Method to minimize unknown stages: pN=

pN=X recoded in pN=0 (433 cases on 597),

M=X for operated patients recoded in M=0 (20 cases on 36), M=X for not operated patients recoded in M=1 (16 cases on 36).

Remaining Stages X are stages with pT=X.

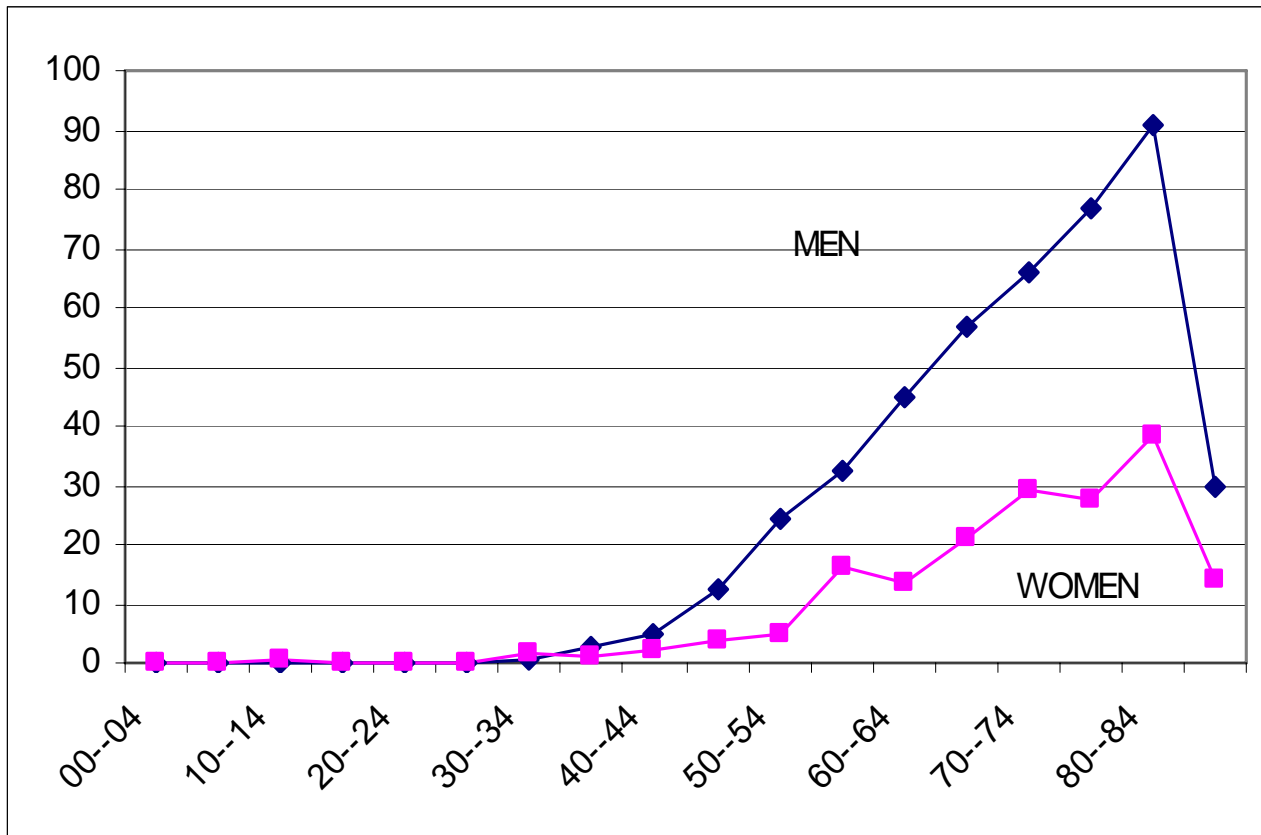


Results

- ★ 597 cases of kidney parenchyma cancer were analysed
- ★ Eleven nephroblastoma cases were excluded from the analysis
- ★ 84 % of the cases were renal cell carcinoma
- ★ Incidence standardized rates were
 - 9.91 per 100 000 men
 - 3.75 per 100 000 women



Specific rates by age and sex



Distribution of Incident cases by stage and by sex

	Men	Women	Total
Stage 1	43 %	46 %	264 (44 %)
Stage 2	11 %	9 %	60 (10 %)
Stage 3	17 %	20 %	108 (18 %)
Stage 4	26 %	24 %	150 (25 %)
Stage x	3 %	1 %	15 (3 %)
Total	403 (100 %)	194 (100 %)	597 (100 %)

Distribution of Incident cases by stage and by age classes

	<=59	60-69	70-79	80 and +	Total
Stage 1	51 %	50 %	39 %	28 %	264
Stage 2	13 %	11 %	7 %	8 %	60
Stage 3	17 %	16 %	24 %	9 %	108
Stage 4	19 %	23 %	27 %	48 %	150
Stage x	0 %	2 %	4 %	6 %	15
Total	175 (100%)	167 (100%)	191 (100%)	64 (100%)	597

Distribution of Incident cases by metastasis status

	Men	Women	Total
M0	73 %	74 %	439 (74 %)
M1	22 %	17 %	122 (20 %)
MX	5 %	9 %	36 (6 %)
Total	403 (100 %)	194 (100 %)	597

	<=59	60-69	70-79	80 and +	Total
M0	77 %	78 %	73 %	53 %	439
M1	18 %	19 %	20 %	31 %	122
MX	5 %	3 %	7 %	16 %	36
Total	175 (100%)	167 (100%)	191 (100%)	64 (100%)	597

Discussion (1)

- ★ Comparison of standardized incidence rates: problem of definition for « kidney cancer »
- ★ Incidence by stage: similar to results from the SEER programme
- ★ Patients 80 years and over have significantly
 - more stage 4 or unknown stage
 - more metastases or unknown statusthan the 3 other age classes (see esp 70-79)



Discussion (2)

Hypothesis for patients 80 years and over:

- Method used to minimize unknown metastasis status (M0 if operated, M1 if not). (10/10 patients 80 and + with MX had not been operated vs. 4/13 for 70-79 age class, 2/5 for 60-69 and 0/ 8 for <60 patients) → **little influence**
- Late diagnosis and fewer clinical investigation to evaluate extension (the study showed tendencies for abdominal scans, intra venal urography, bone scintigraphy, thoracic scans. They were performed less frequently for 80 and+ patients than for 70-79)



Conclusion

- ★ This study provides more information on descriptive epidemiology of kidney parenchyma cancer
- ★ It complements a survival and prevalence study (see poster) to identify the target population of a new multi targeted treatment
- ★ Early diagnosis for all groups is of prime importance.

