

EVALUATION OF PROFESSIONAL PRACTICE ON THE MANAGEMENT OF CHEMOTHERAPY INDUCED NAUSEA AND VOMITING

INTRODUCTION

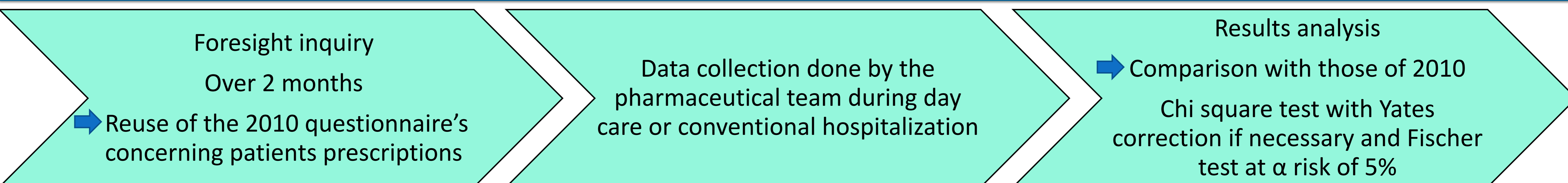
- Nausea and vomiting are undesirable side effects of cytotoxic chemotherapy.
- In 2009, new guidelines on prevention and treatment of nausea and vomiting induced by chemotherapy were issued.¹
- In the context of the V2010 certification of Robert Ballanger hospital, a first evaluation of professional practice in drug therapy for patients with lung cancer was performed. It has resulted in an appreciation of treatment conformity while applying the new recommendations.
- Corrective measures were issued after this first evaluation.

PURPOSE

2013 → Comparative survey

Effectiveness evaluation of the improvement measures put in place and of the ameliorations induced by following the new recommendations.

MATERIALS AND METHODS



RESULTS AND DISCUSSION

	2010	2013	Statistical differences
2010 34 surveys	→		2013 33 surveys
Male	29 (85%)	21 (64%)	S
Female	5 (15%)	12 (36%)	significant
Age	62,3 years	63,6 years	NS non significant
Weight	69,5 kg	69,2 kg	
Creatinine clearance Cockcroft (mL/min)	87,6	81,1	
Creatinine clearance MDRDC (mL/min/1,73m ²)	96,7	90,0	

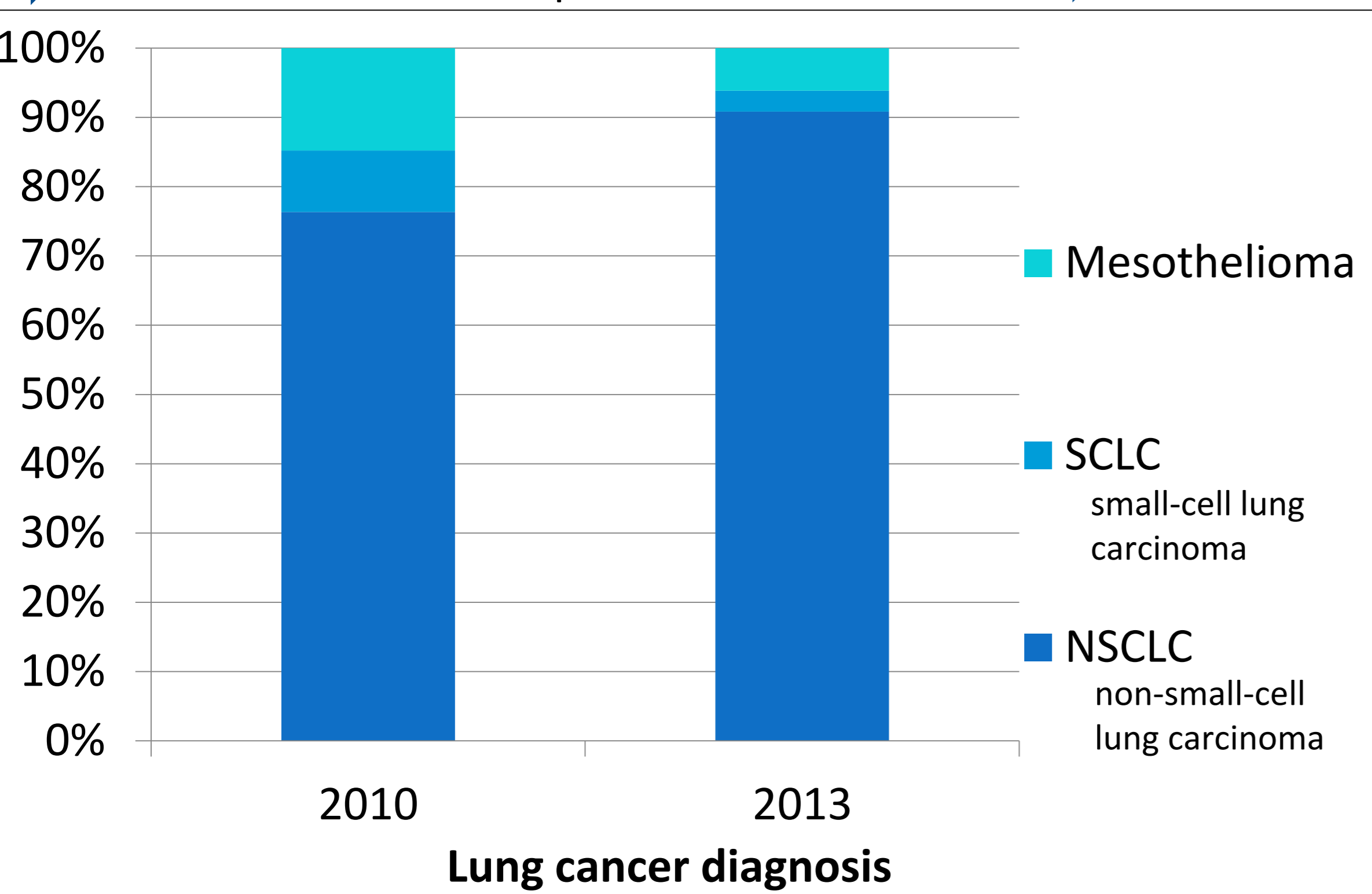
	2010	2013	Statistical differences
Patient received the cure the same day (if "no", cure received the day before)	34 (100%)	32 (97%)	NS
Patient received in day care (if "no", received during conventional hospitalization)	33 (97%)	31 (94%)	
Cure administration on the scheduled day (if "no", day shift)	27 (79%)	30 (91%)	
Computerized antiemetic treatment prescription	34 (100%)	33 (100%)	
Antiemetic premedication protocol	34 (100%)	33 (100%)	

	2010	2013	Statistical differences
Number of hospitalization days for the protocol (day per patient)	1,18	1,10	NS
Number of molecules per protocols (molecules per patient)	1,68	1,66	NS
Average time of Intravenous therapy of the cisplatin (min)	101,19	80,00	S
Fractionation of the cisplatin needed	yes	no	NS
	1 (8%)	11 (92%)	
	yes	no	
	1 (6%)	16 (94%)	

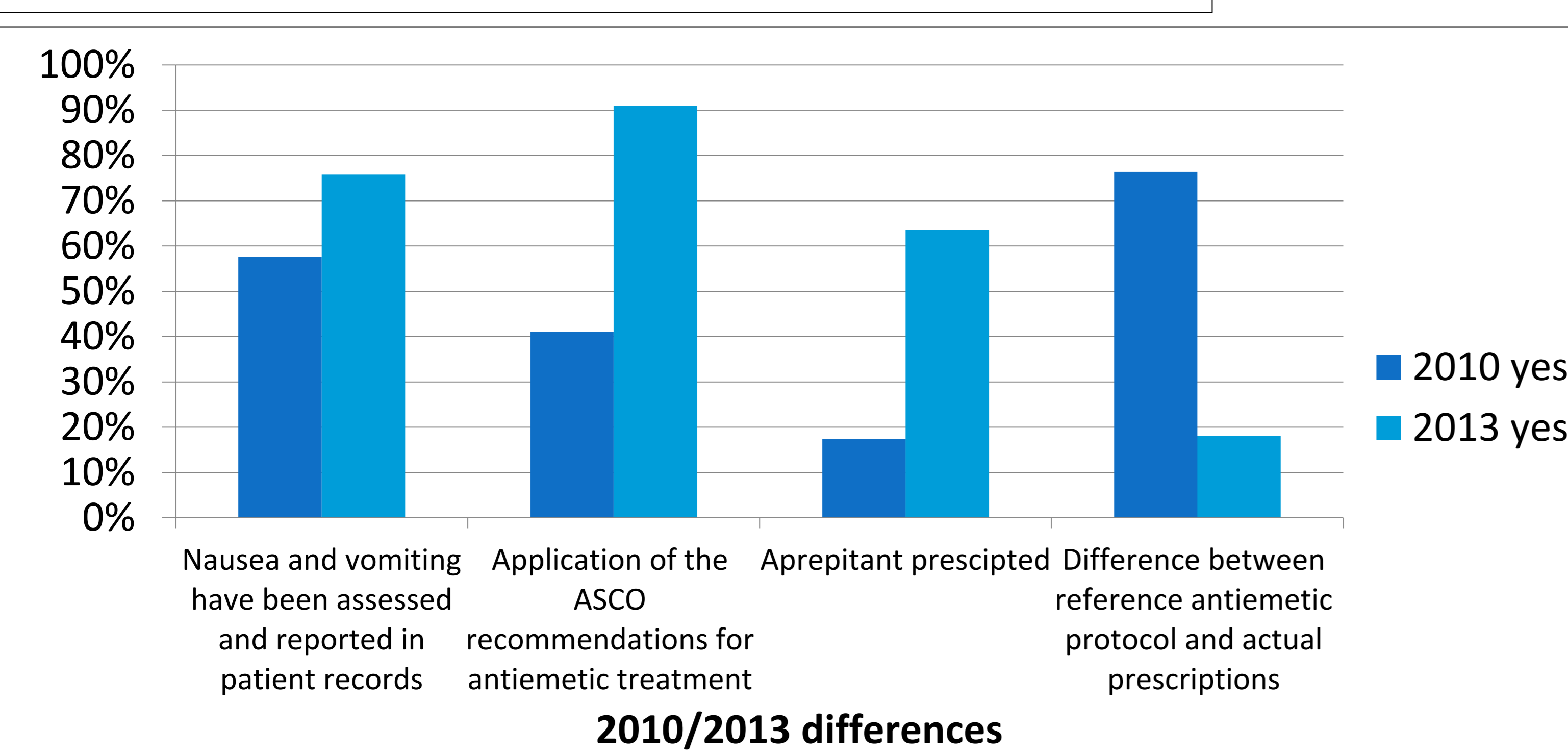
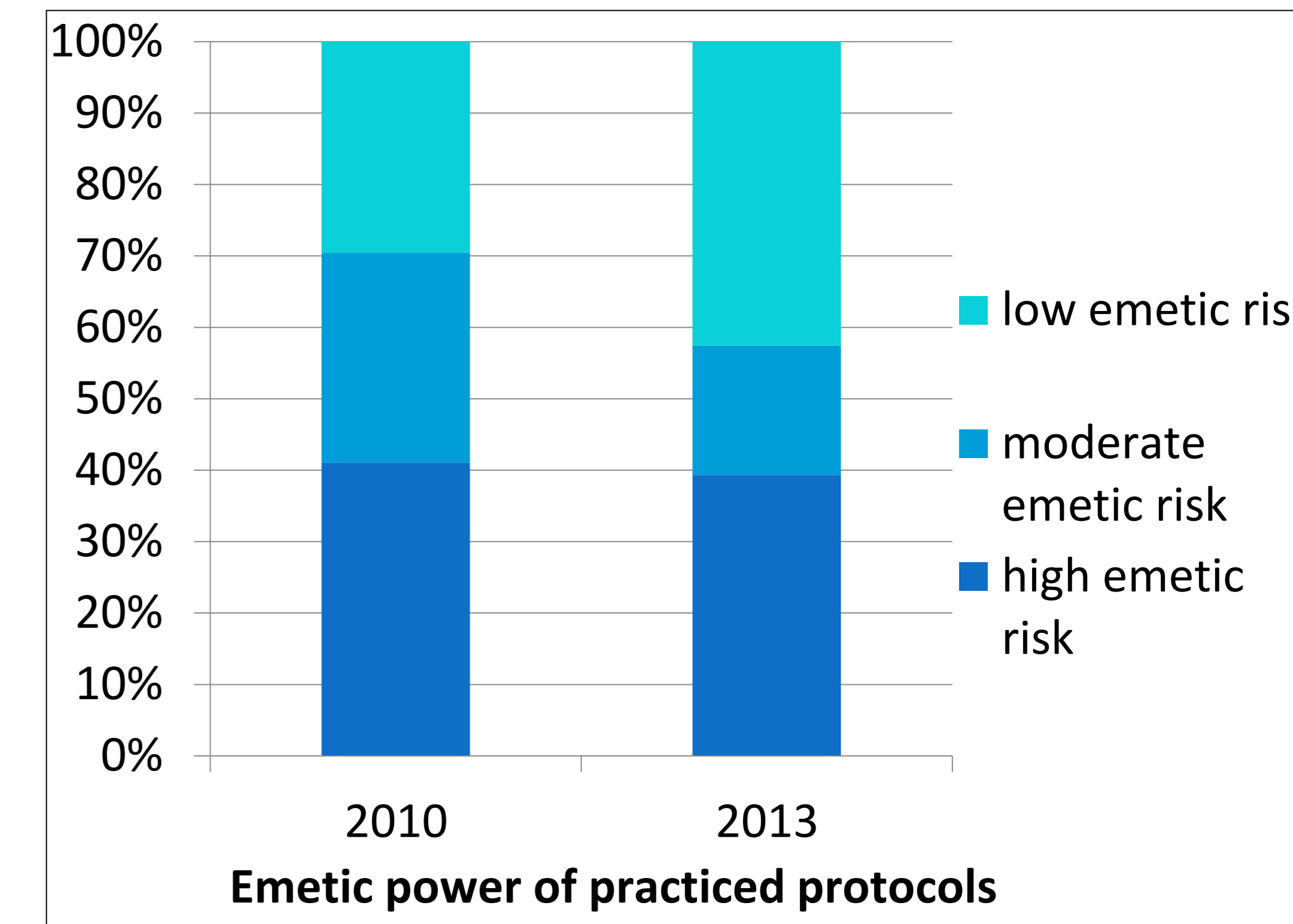
→ The proportion of women (36%) is higher than in 2010 (15%) but no difference was observed in the average age and the mean creatinine clearance.
→ The two studies are comparable.

→ Almost all the patients have received their cure the same day, as scheduled.
→ Computerized antiemetic treatment prescription for all patients.
→ No differences between the two studies.

→ Average number of days at the hospital, average number of molecules per protocol, and proportion of fractionation of the cisplatin are no different.
→ The average passing time of the cisplatin is different.



→ The diagnoses distribution and the emetic power of practiced protocols are the same.
→ The two studies are comparable.



→ Nausea and vomiting are better assessed and reported in patient records (58% in 2010 to 76% in 2013).
→ An improvement in the applications of the new recommendations and those of the ASCO (American Society of Clinical Oncology) for antiemetic treatment including a prescription of aprepitant increase were observed (p < 0.001).
→ Less difference between reference antiemetic protocol and actual prescriptions are observed (p < 0.001).

CONCLUSION

- The modifications made in 2010 : change of anti-emetic protocols in the Chimio® software and implementation of a prescription model, based on the emetic protocol, have had a positive impact and helped improving drug therapy of nausea and vomiting induced by chemotherapy.
- The new recommendations are better applied including the prescription of aprepitant, optimizing cares.
- However, standardization of care must not compromise the individual adaptability of anti-emetic patient therapy.