Les récidives loco-régionales

Y-a-t-il une place pour une 2ème irradiation ?

Jean-Michel Hannoun-Levi
Pôle de Radiothérapie – Centre Antoine Lacassagne - NICE

Congrès SFPM 2013 - 13 au 15 novembre 2013 - Corum - Montpellier

Taux d’incidence du cancer du sein

≈ 22/100.000

http://www.livestrong.com/article/55159-statistics-breast-cancer-recurrence/

Taux d'incidence du cancer du sein

≈ 22/100.000

Taux d'incidence de rechute loclale homolatérale (RLH)

≈ 1.3 à 1.7% entre la 2ème et la 7ème année

≈ 0.4%/an @ 10 ans

http://www.livestrong.com/article/55159-statistics-breast-cancer-recurrence/

Quel traitement local pour une RLH?

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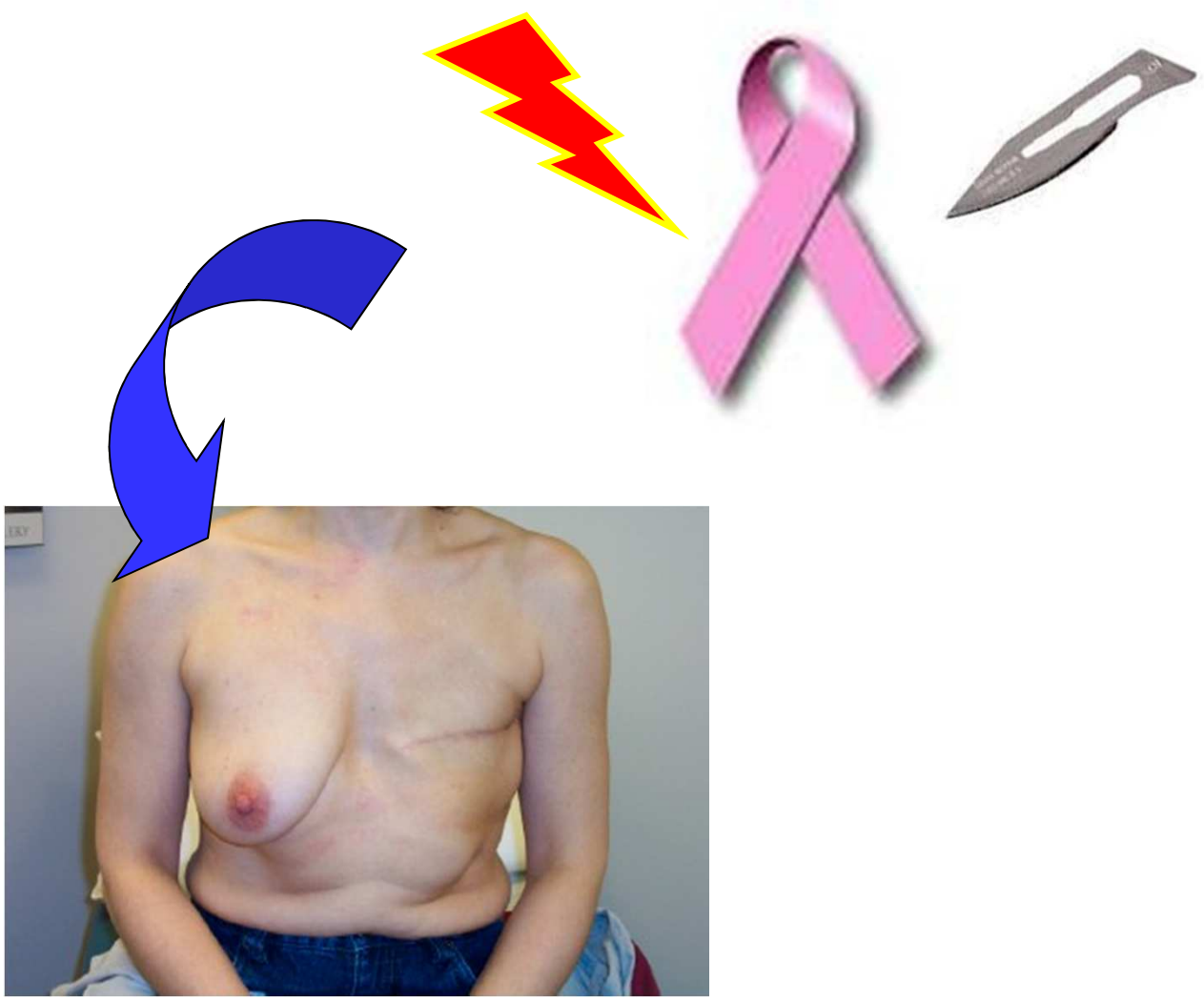

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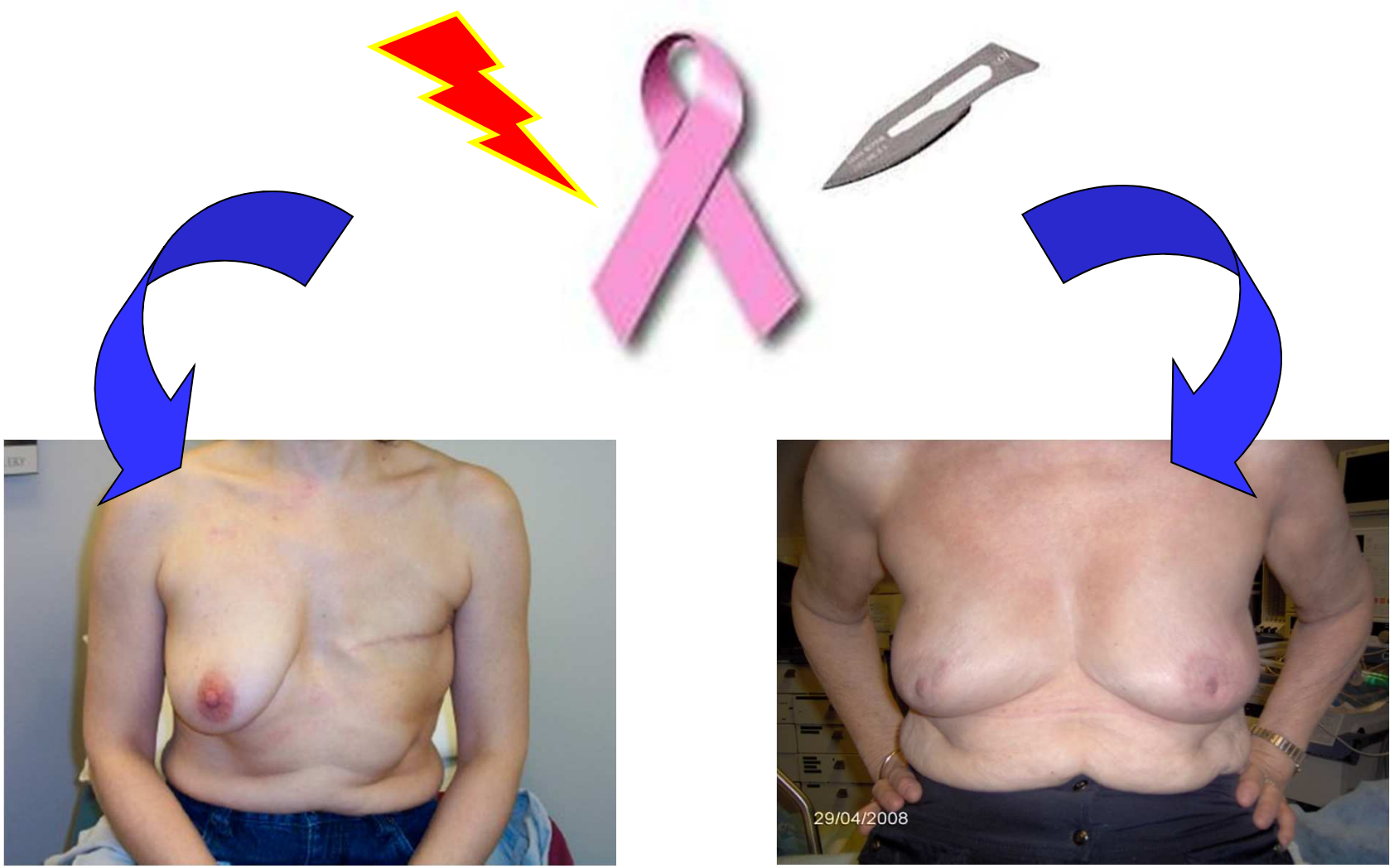

Contents lists available at SciVerse ScienceDirect

Cancer Treatment Reviews

journal homepage: www.elsevierhealth.com/journals/ctrv

Anti-tumor treatment

Local treatment options for ipsilateral breast tumour recurrence

Jean-Michel Hannoun-Levi [a,*], Tarik Ihrai [b], Adel Courdi [a]

[a] Department of Radiation Therapy, Antoine Lacassagne Cancer Center, University of Nice-Sophia, Nice, France
[b] Department of Surgical Oncology, Antoine Lacassagne Cancer Center, University of Nice-Sophia, Nice, France

Mastectomie

	# pts	MFU (months)	2nd LR (%)	5-year DMFS (%)	5-year DFS (%)	5-year CSS (%)	5-year OS (%)
Kurtz 1988	66	84	12	-	-	-	-
Fowble 1990	52	25	-	-	59	-	84
Osborne 1992	46	28	15	-	55	-	76
Cajucoum 1993	25*	52	32	-	51	-	65
Abner 1993	123	39	6	-	41	-	-
Voogd 1999	266	60	25	47			61
Salvadori 1999	134	-	4	55 (4-y)	-	-	70
Doyle 2001	112	44	3	47 (10-y)	-	-	69 (10-y)
Huang 2002	126	-	12	45 (10-y)	-	62 (10-y)	58 (10-y)
Alpert 2005	116	244	7	32 (10-y)	-	73 (10-y)	66 (10-y)
Chen 2008	568	-	-	-	-	-	78

≈10%

Tumorectomie

Authors	# pts	MFU (months)	2nd LR (%)	DMFS (%)	10-year CSS (%)	10-year OS (%)
Kurtz 1988/1991	50	51	32	-	64	42
Abner 1993	16	39	31	-	-	-
Dalberg 1998	17	-	12.5	-	-	-
Salvadori 1999	57	-	19	80 (4-y)		85 (5-y)
Alpert 2005	30	244	7	24 (10-y)	61	58
Chen 2008	179	-	-	-	-	57

≥20%

Tumorectomie + re-irradiation

Authors	# pts	MFU (months)	IT	Dose (Gy)	2nd LR (%)	5-year DFS (%)	5-year OS (%)	G3-4 tox (%)	Exc/Gc CR (%)
Maulard 1995	15	48	ILB	30	26	31	61	8	53
	23	36	ILB*	60-70	17	41	50		
Deutsch 2002	39	63	e- TB	50	21	68	78	-	69
Hannoun-Levi 2004	24	[illegible]	[illegible]	30	25	69	92	10	-
	45		[illegible]	46	11				-
Chadha 2008	15	36	ILB	30-45	7	-	100 (3-y)	0	100
Trombetta 2008/2009	25	38	ILB/MHB	45-50/34	4	-	-	14	92
Guix 2010	36	89	IHB	30	3	64 (10-y)	97 (10-y)	0	-
Hannoun-Levi 2010	42	21	IHB	34	2	-	-	3	97
Kauer-Dorner 2012	39	57	IPB	56	7	77	87	7	37

≈10%

* Without 2nd lumpectomy

Tumorectomie + re-irradiation

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	45		ILB	46	11				-
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Randomized Co
Case-Control Studies
Case Series, Case Reports
Editorials, Expert Opinion

ESTRO

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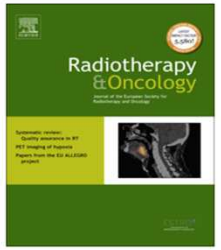
journal homepage: www.thegreenjournal.com



Original article

Accelerated partial breast irradiation with interstitial brachytherapy as second conservative treatment for ipsilateral breast tumour recurrence: Multicentric study of the GEC-ESTRO Breast Cancer Working Group

Jean-Michel Hannoun-Levi [a,*], Alexandra Resch [b], Jocelyn Gal [c], Daniela Kauer-Dorner [b], Vratislav Strnad [d], Peter Niehoff [e], Kristina Loessl [f], Gyoergy Kovács [g], Erick Van Limbergen [h], Csaba Polgár [i], On behalf of the GEC-ESTRO Breast Cancer Working Group

[a] *Department of Radiation Oncology, Antoine Lacassagne Cancer Center, University of Nice-Sophia, France;* [b] *Department of Radiotherapy and Radiobiology, University of Vienna, Austria;* [c] *Biostatistic Unit, Antoine Lacassagne Cancer Center, Nice, France;* [d] *Department of Radiation Oncology, University Hospital Erlangen;* [e] *Department of Radiotherapy, City Hospital Cologne, Germany;* [f] *Department of Radiation Oncology, Bernes, Switzerland;* [g] *Interdisciplinary Brachytherapy Unit, University of Luebeck, Germany;* [h] *Department of Radiation Oncology, University Hospital Gasthuisberg, Leuven, Belgium;* [i] *Center of Radiotherapy, National Institute of Oncology, Budapest, Hungary*

GEC-ESTRO Breast Cancer WG study

- ✓ Période d'étude : 09/00 – 09/10

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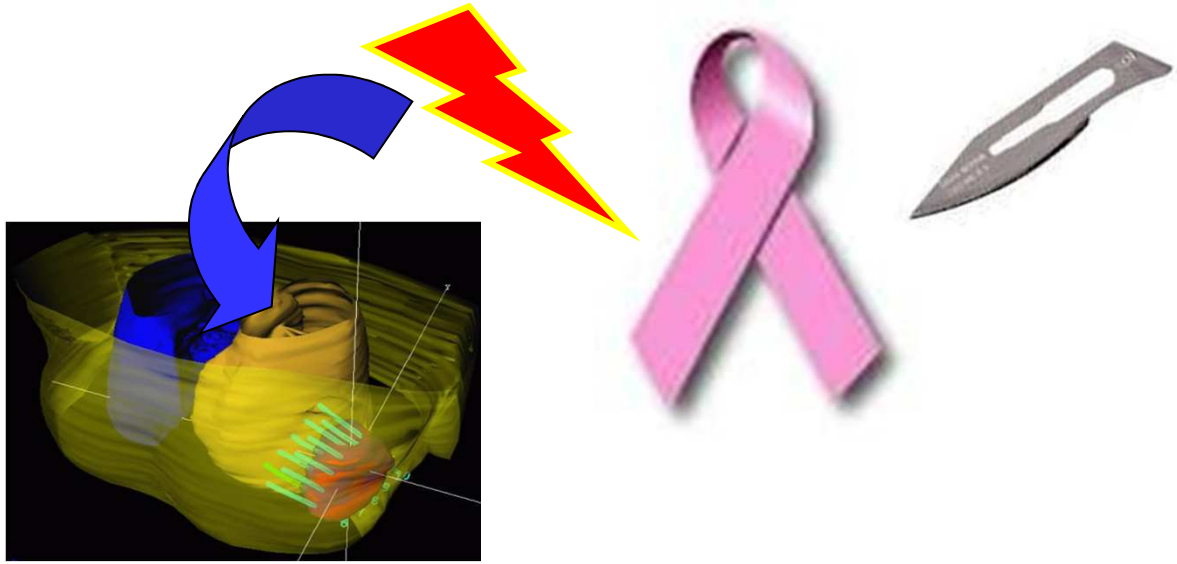

Matériel & Méthode - Patients

- ✓ Age médian (years):
  - – primaire (P) 50 [19 - 83]
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- ✓ Interval: 9.4 [1.1 - 35.4]

  [P - R] (ans)

Matériel & Méthode - Tumeurs

Characteristic		Primary		IBTR	
		#	Median % [range]	#	Median % [range]
#Patients				217	
Age (years)			50.3 [19–83]		60.6 [28–85]
Time to IBTR (years)					10.1 [1.1–35.3]
IBTR site	ITB			111	51.2
	Close to ITB			35	16.1
	Other quadrant			45	20.7
	Unknown			26	12.0
pT size (mm)			15.4 [1–60]		12.4 [1–55]
pLN status	Negative	141	65.0	59	27.2
	Positive	35	16.1	8	3.7
	Unknown	41	18.9	150	69.1
HG	1	36	16.6	34	15.7
	2	60	27.6	81	37.3
	3	40	18.4	58	26.7
	Unknown	81	37.3	44	20.3
HR status	Positive	93	42.9	158	72.8
	Negative	34	15.6	43	19.8
	Unknown	90	41.5	16	7.4
Her2 status	Negative	39	18.0	122	56.2
	+	7	3.2	28	12.9
	++	9	4.1	13	6.0
	+++	11	5.1	28	12.9
	Unknown	151	69.6	26	12.0
Hormonal therapy	Yes	84	38.7	141	65.0
	No	103	47.5	71	32.7
	Unknown	30	13.8	5	2.3
Chemotherapy	Yes	76	35.1	43	19.8
	No	137	63.1	171	78.8
	Unknown	4	1.8	3	1.4
Trastuzumab	Yes	3	1.4	4	1.8
	No	214	98.6	213	98.2
WBI dose (Gy)			56.0 [30–69.6]		

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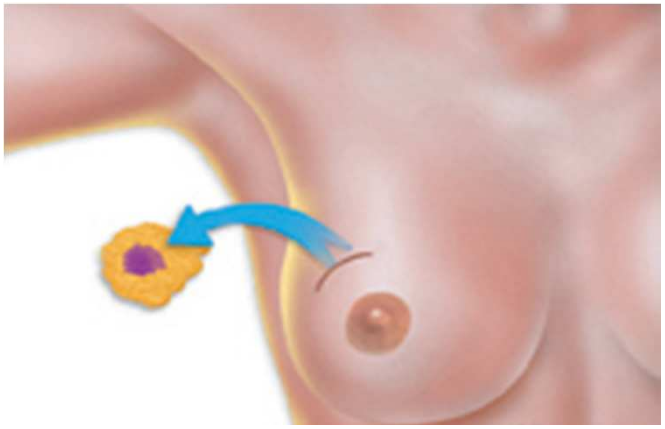
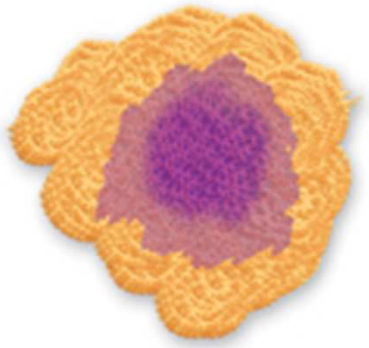
Matériel & Méthode – Traitements





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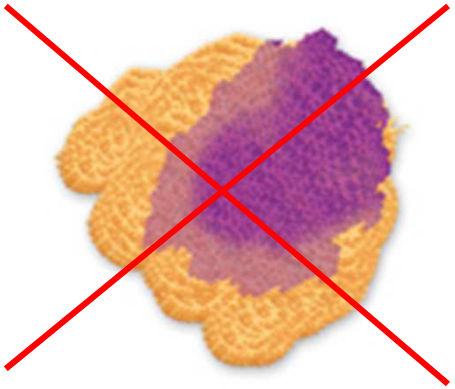
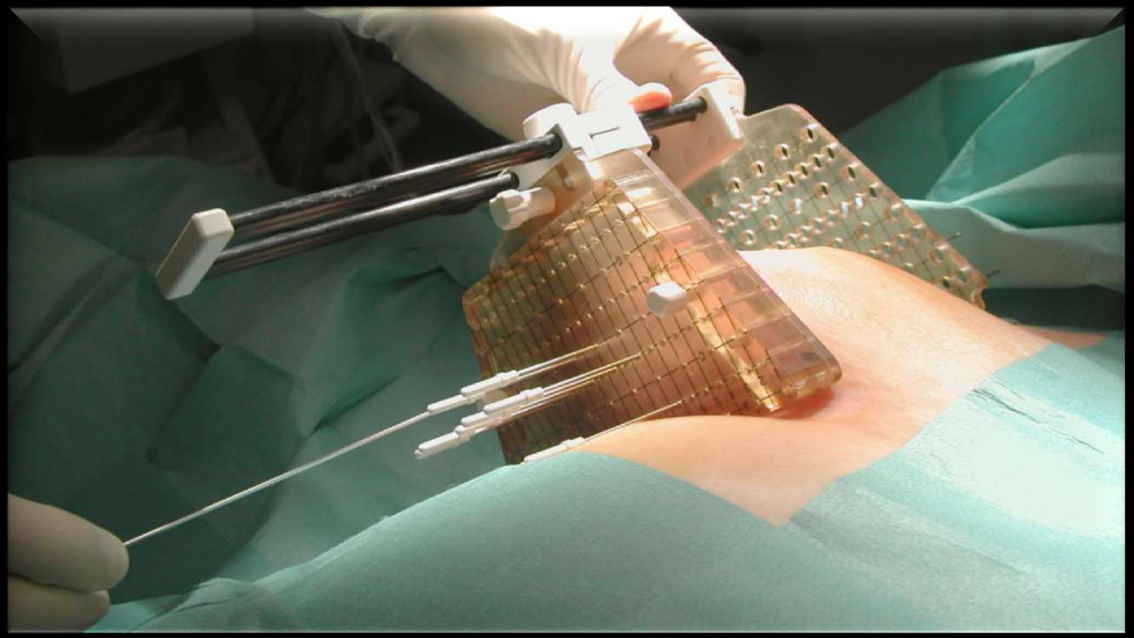
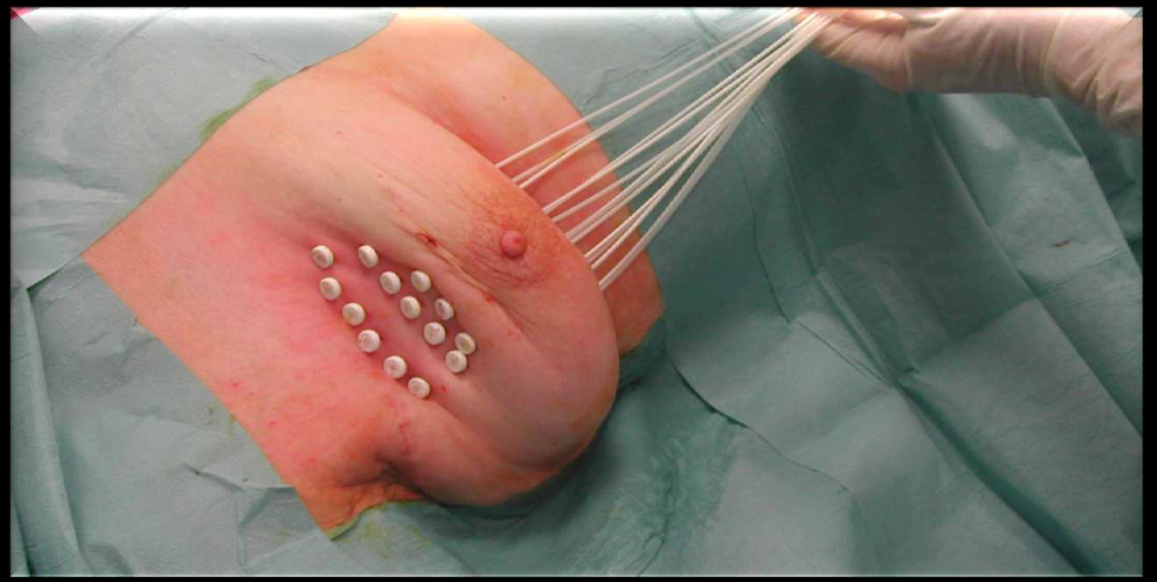


Dirty margins






Clip
Target volume
50 %
75 %
100 %
125 %
150 %
200 %


34 Gy en 10 fractions et 5 j
HDJ

Resultats cliniques

- ✓ Suivi médian (ans):
  - de la tumeur primaire 14.5 [3.5 – 38.2]
  - de la rechute 3.9 [1.1 – 10.3]

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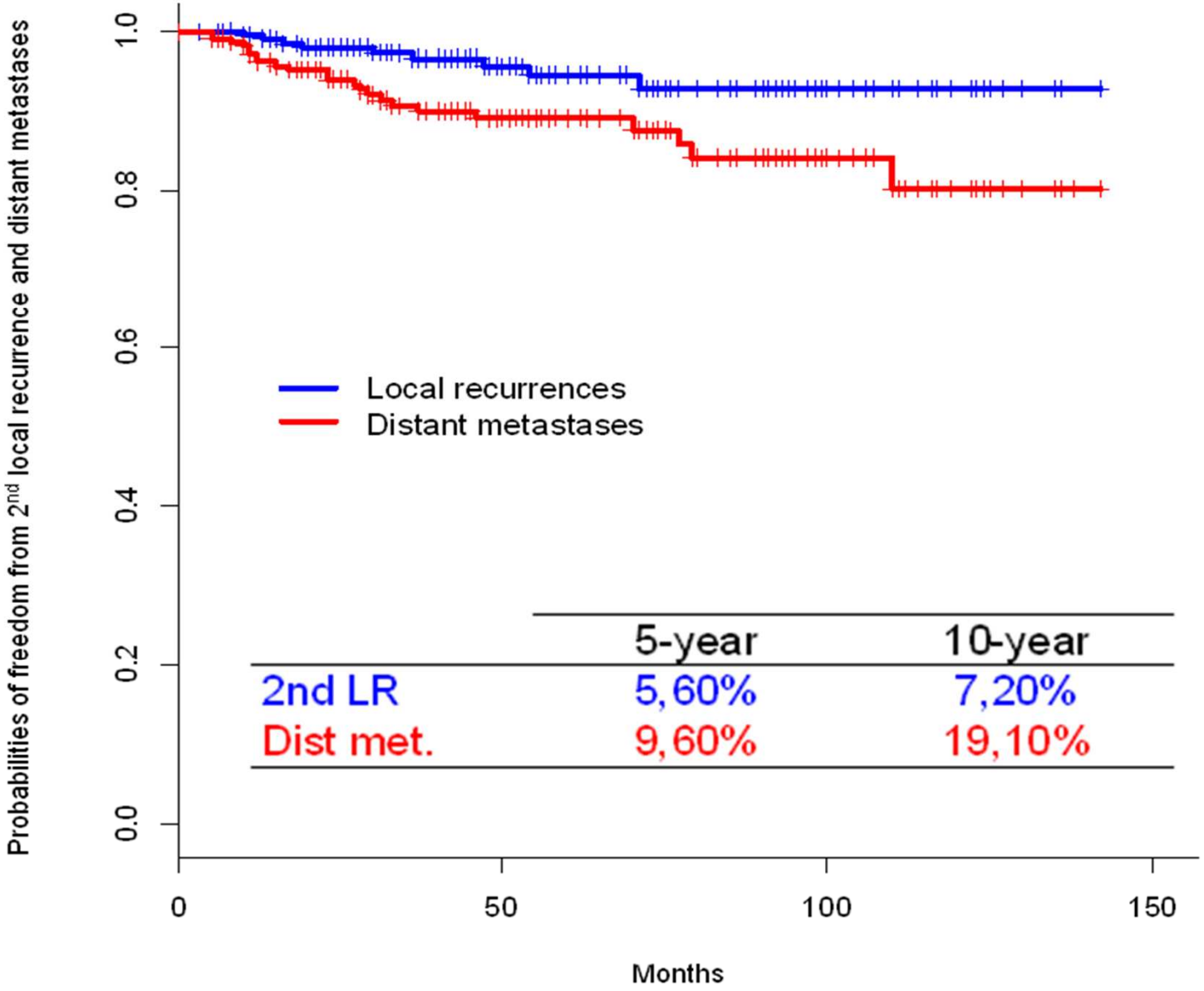
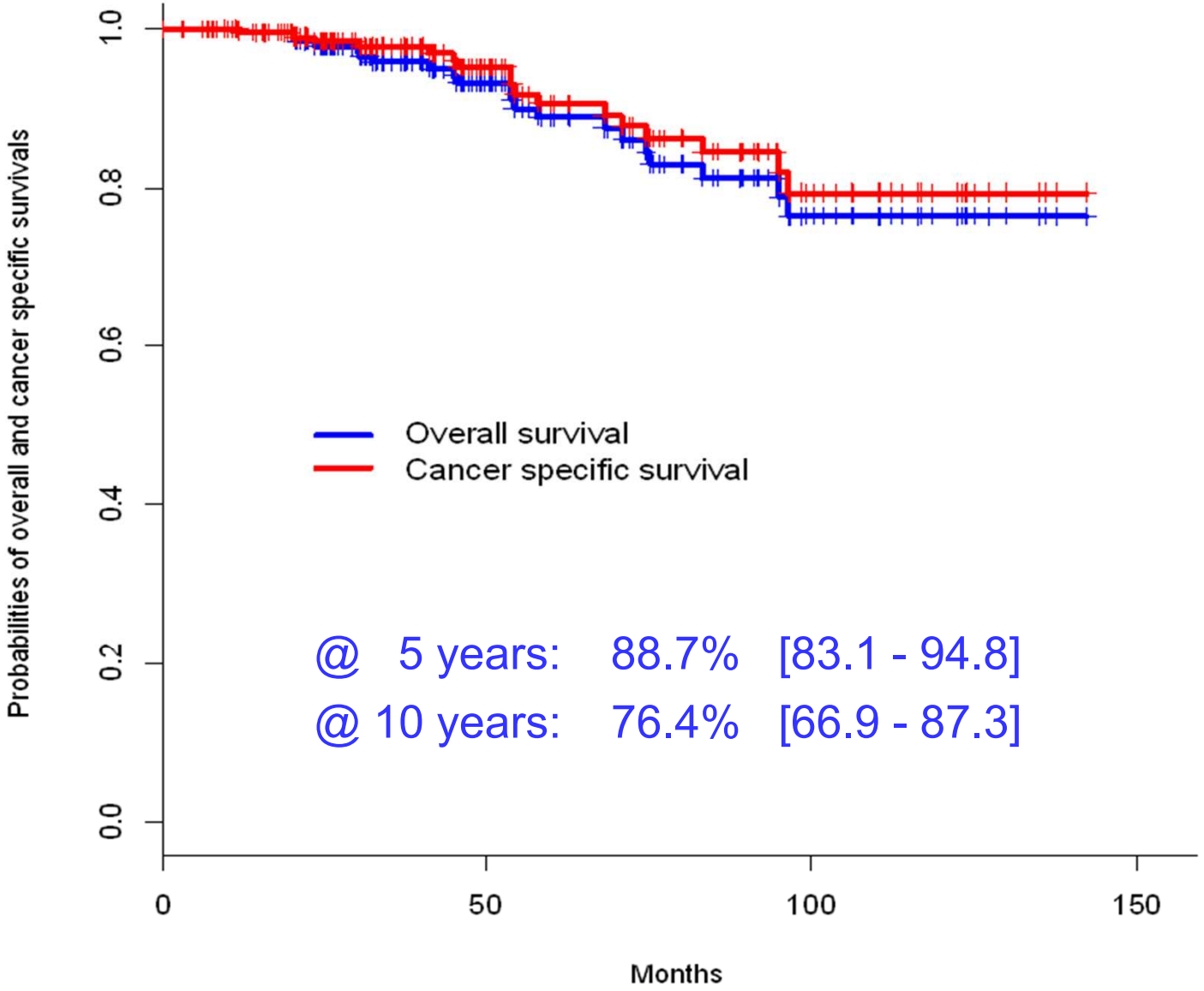
  - de la rechute 3.9 [1.1 – 10.3]

- ✓ 2nd rechute locale: 9 pts 4.1%
- ✓ Rechute regionale : 1 pt 0.5%
- ✓ Metastases: 22 pts 10.1%

Actuarial 2nd local recurrence & distant met. rates



Actuarial overall & cancer specific survival rates



MVA result summary

	UVA			MVA		
	IBTR data		*p* Value	IBTR data		*p* Value
2nd LR	Age (years)	>55	0.035			
	HG	III	0.0003	HG	III	0.008
	HR	HR−	0.001			
DM	pT (mm)	>20	0.03	pT	>20	0.03
OS	pT (mm)	>20	0.007			
	HG	III	0.009	HG	III	0.02
	HR	HR−	0.01			

UVA: univariate analysis; MVA: multivariate analysis; 2nd LR: second local recurrence; DM: distant metastases; OS: overall survival; pT: pathological tumour size (mm); HG: histological grade; HR: hormonal receptor status (HR− = ER−/PR−).

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	HR	HR−	0.01			

UVA: univariate analysis; MVA: multivariate analysis; 2nd LR: second local recurrence; DM: distant metastases; OS: overall survival; pT: pathological tumour size (mm); HG: histological grade; HR: hormonal receptor status (HR− = ER−/PR−).

MVA result summary

	UVA			MVA		
	IBTR data		*p* Value	IBTR data		*p* Value
2nd LR	Age (years)	>55	0.035			
	HG	III	0.0003	HG	III	0.008
	HR	HR−	0.001			
DM	pT (mm)	>20	0.03	pT	>20	0.03
OS	pT (mm)	>20	0.007			
	HG	III	0.009	HG	III	0.02
	HR	HR−	0.01			

UVA: univariate analysis; MVA: multivariate analysis; 2nd LR: second local recurrence; DM: distant metastases; OS: overall survival; pT: pathological tumour size (mm); HG: histological grade; HR: hormonal receptor status (HR− = ER−/PR−).

Resultats – Effets tardifs

- ✓ Effets tardifs : 141 pts (65%)
  193 complications

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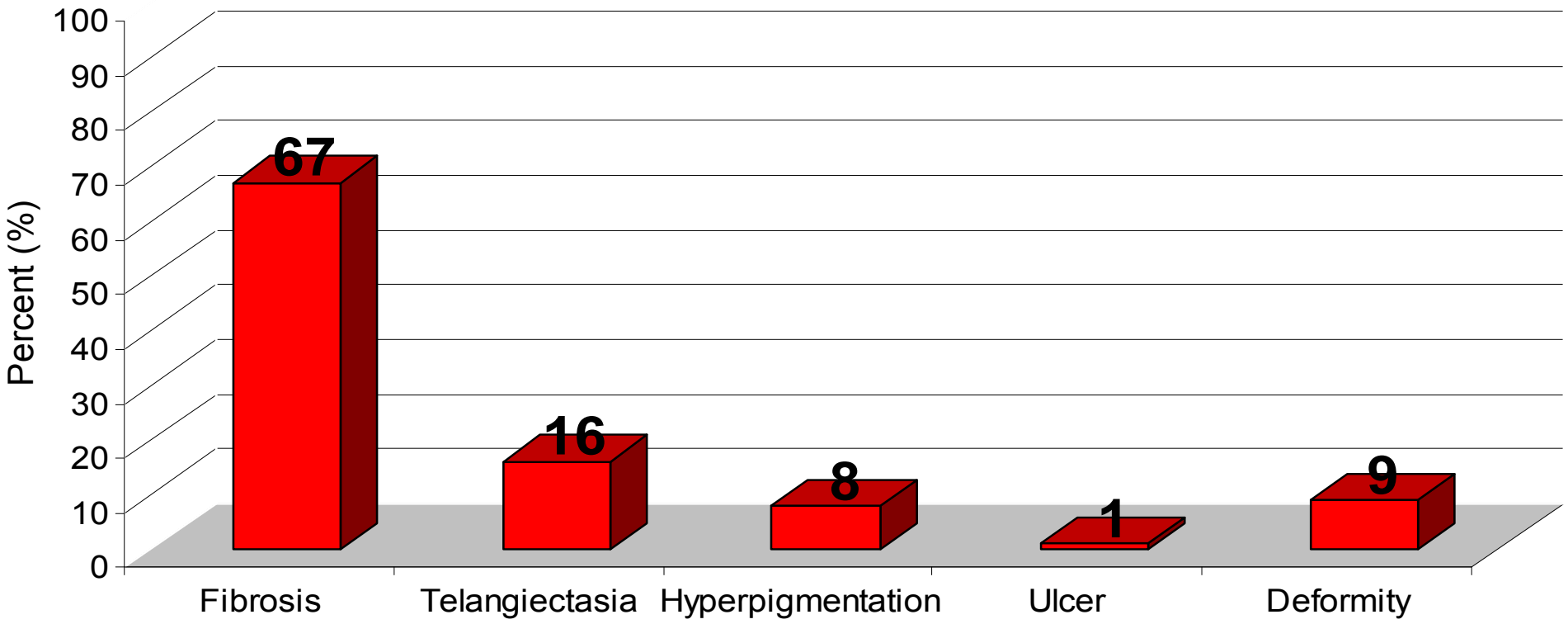
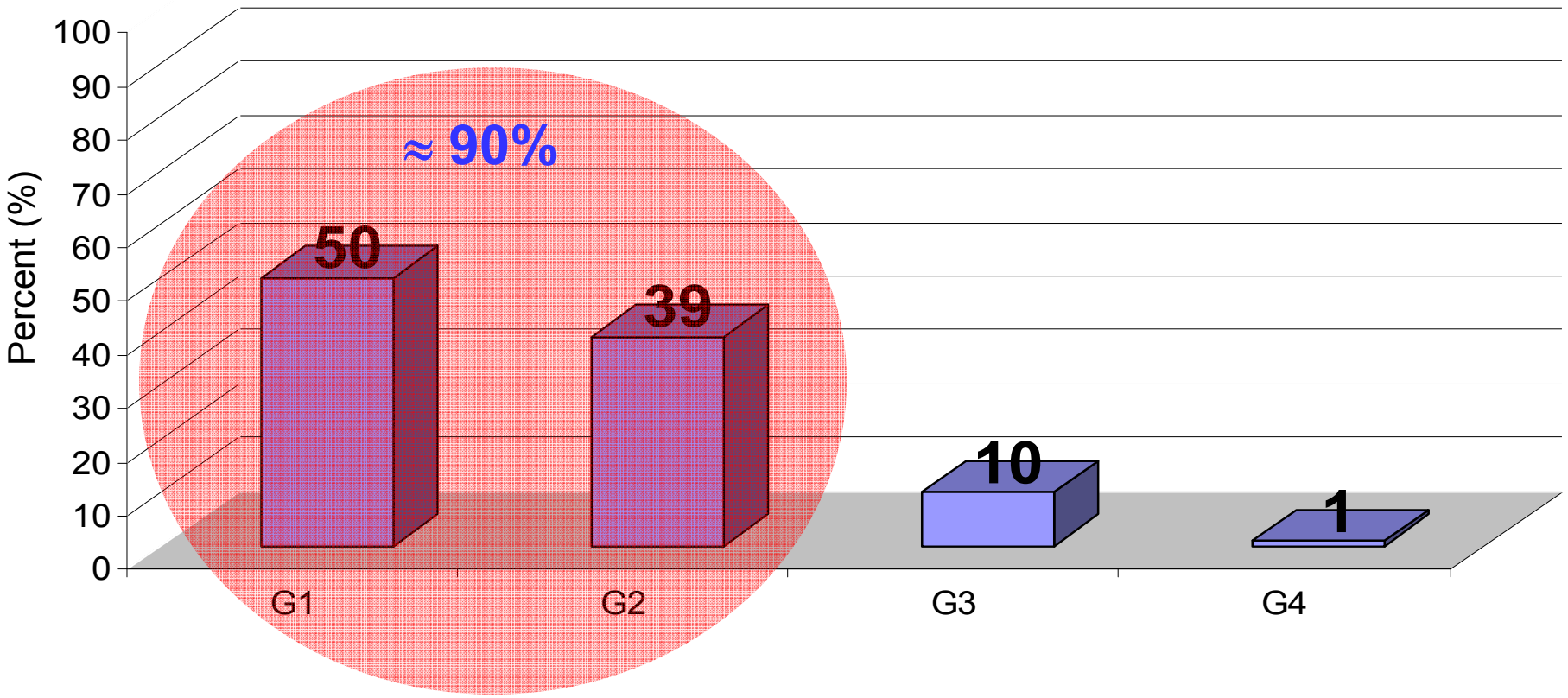
  - ✓ Types
  - ✓ Grades
  - ✓ Résultats cosmetiques (109 pts)

    Wazer D. et al IJROBP 2002

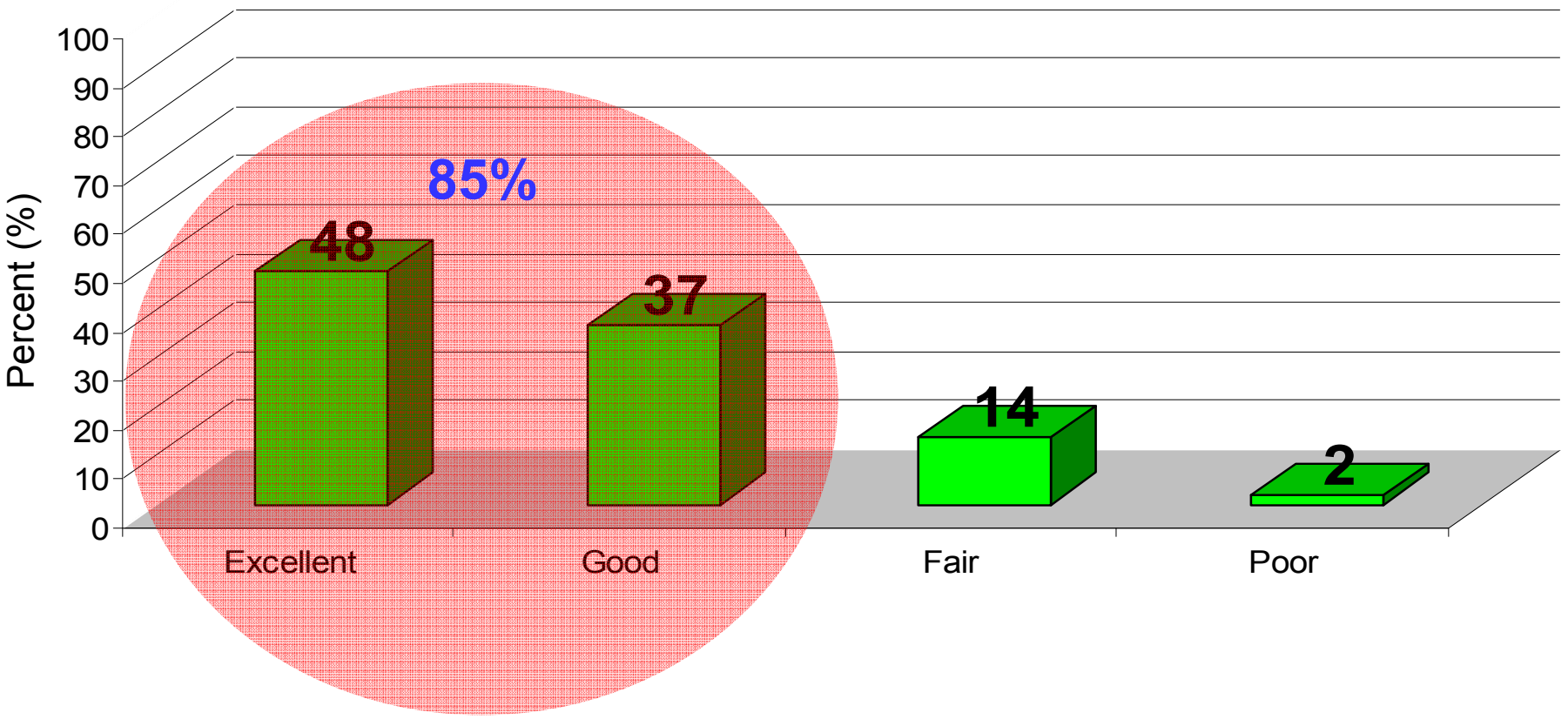
Resultats – Types



Resultats – Grades



Resultats cosmetiques (109 pts)



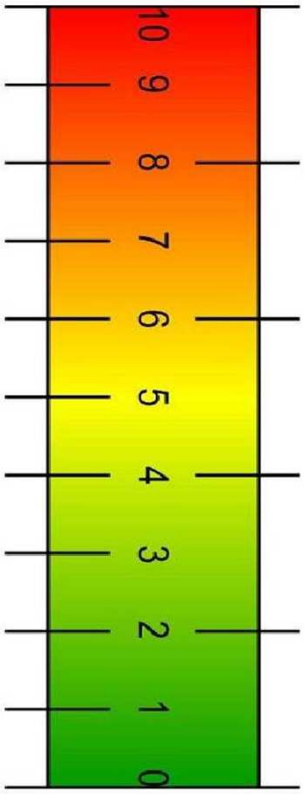

Excellent


29/04/2008
Bon


Moyen

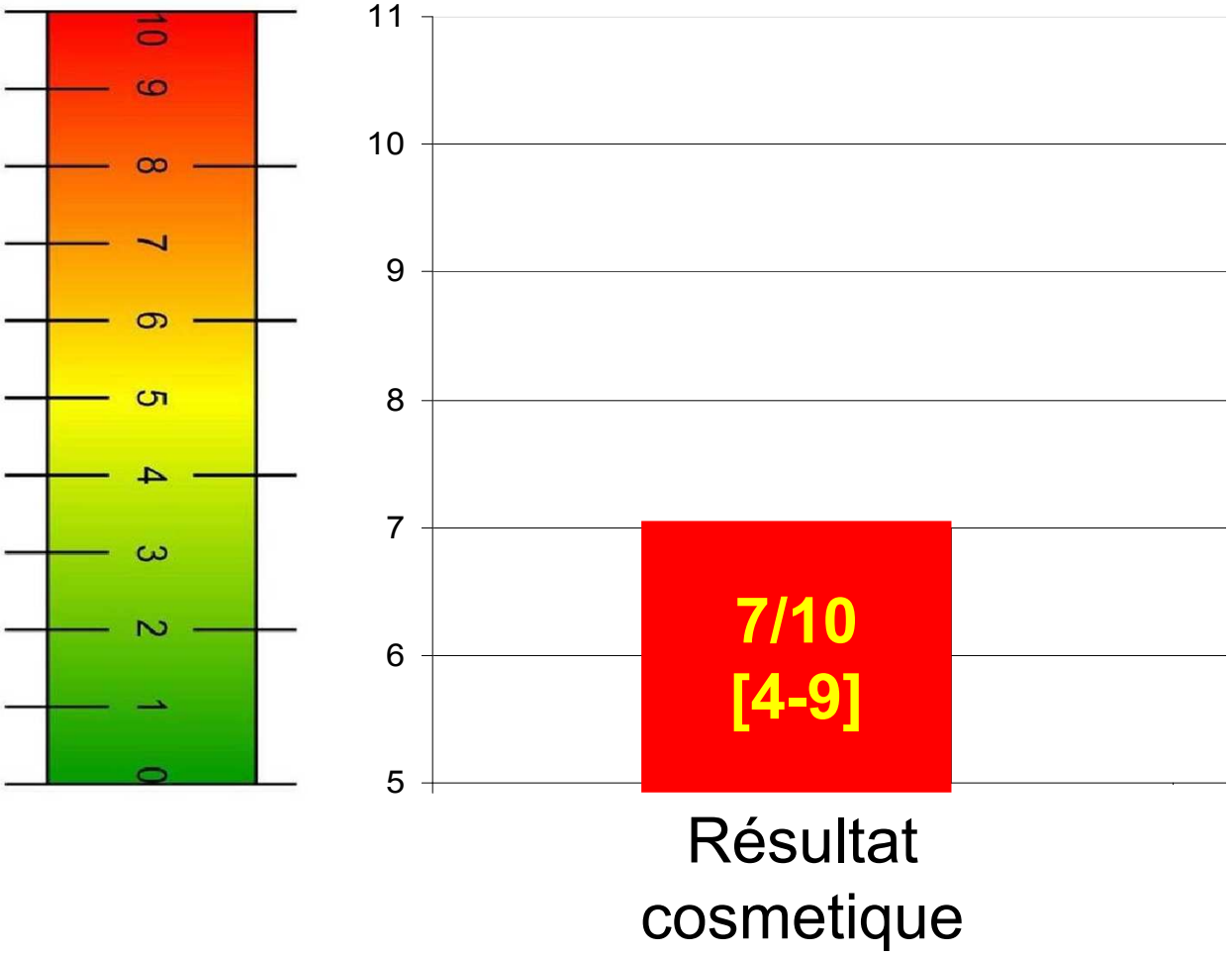

Mauvais

Analyse par la patiente du résultat comsétique (EVA)



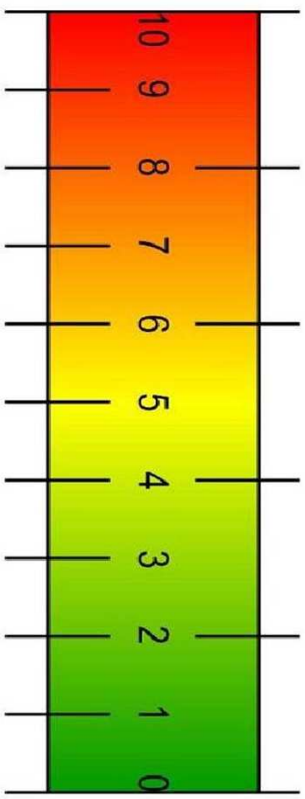
Hannoun-Levi JM et al. Brachytherapy 2010

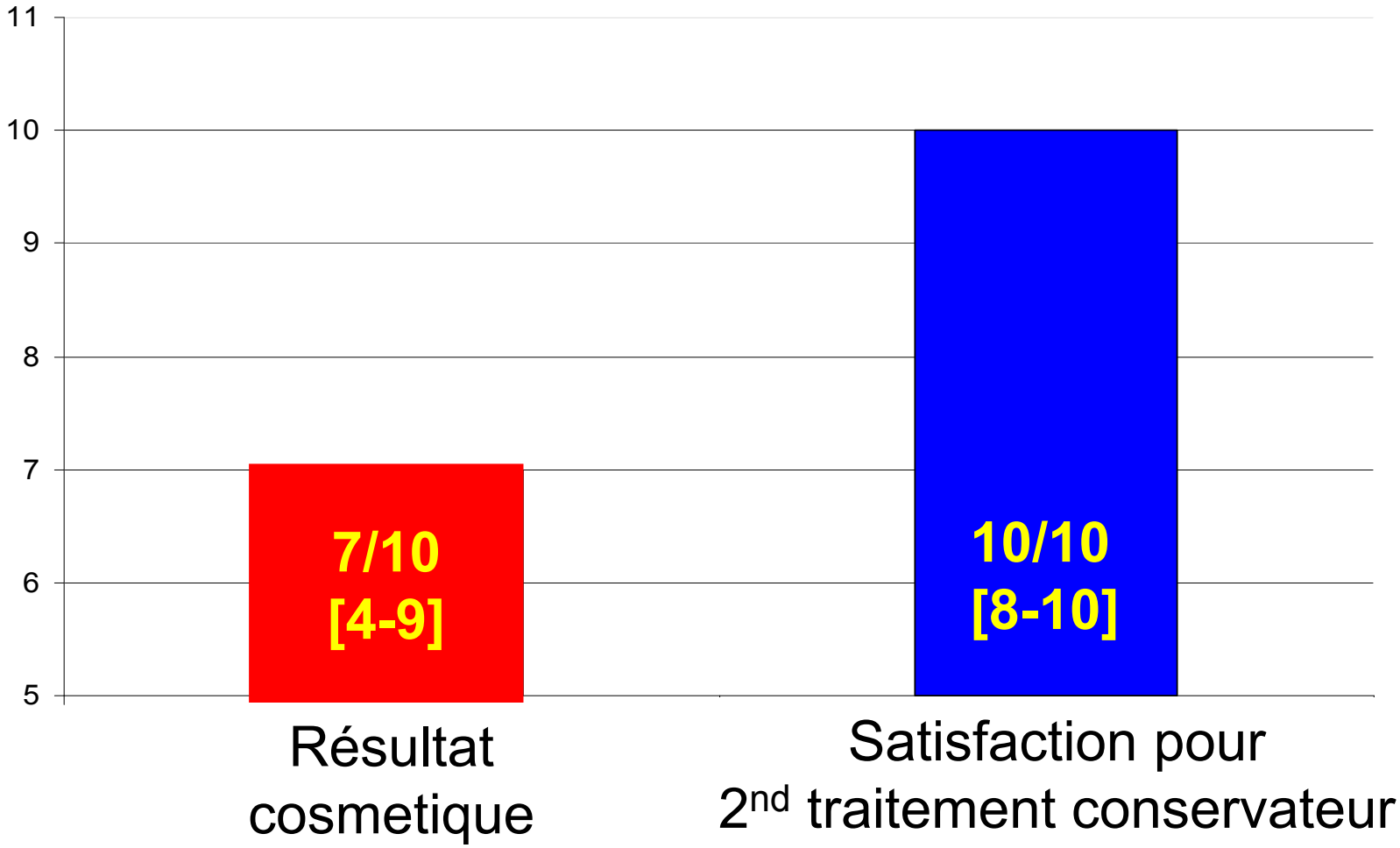
Analyse par la patiente du résultat comsétique (EVA)



Hannoun-Levi JM et al. Brachytherapy 2010

Analyse par la patiente du résultat comsétique (EVA)





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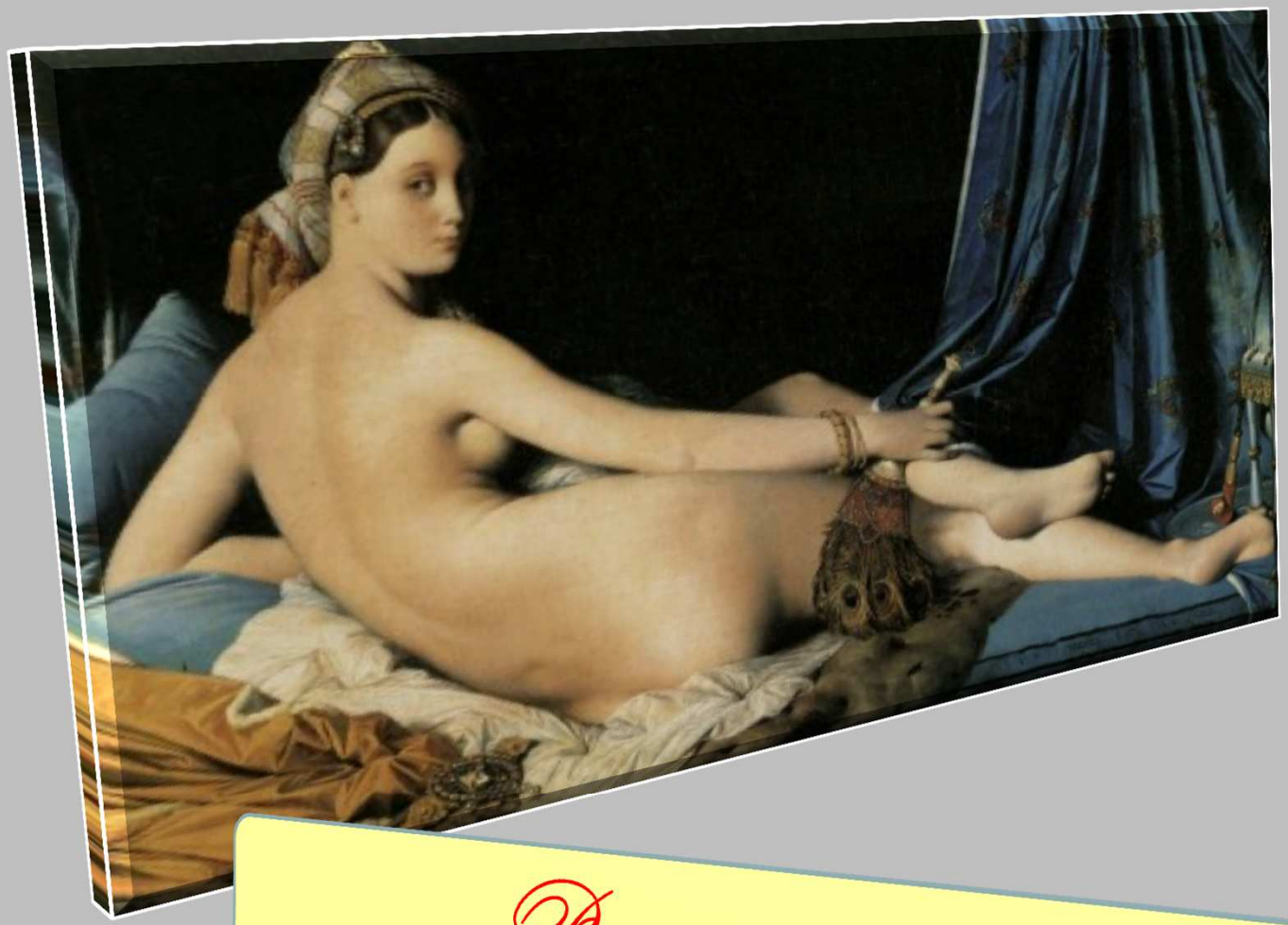


Perspectives

RTOG®
RADIATION THERAPY ONCOLOGY GROUP

Protocol Info
Forms
Regulatory Resources
Broadcasts
Contact Personnel

RTOG 1014 Protocol Information

A Phase II Study of Repeat Breast Preserving Surgery and 3D-Conformal Partial Breast Re-Irradiation (PBRI) for Local Recurrence of Breast Carcinoma

Protocol Documents

Protocol **Current Version Date:** 12/1/2011

Informed Consent

Summary of Changes

Track Amendments/ Update

Case Credits/Reimbursement Info

Principal Investigator: Douglas W. Arthur, MD

GEC-ESTRO Workshop

22 November, 2013 | Brussels, Belgium

ESTRO European Society for RADIOTHERAPY & ONCOLOGY

GEC-ESTRO BCWG Phase II trial for 2nd breast conservative treatment

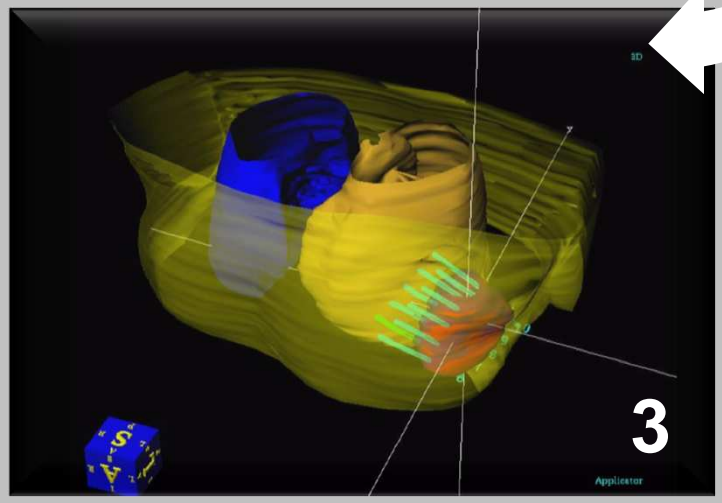
Conclusions

En pratique

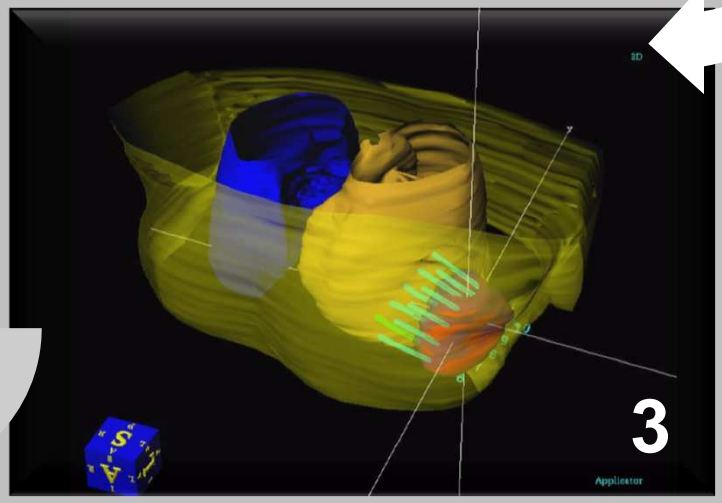
En pratique

En pratique

En pratique



En pratique



Conclusions

Pas de traitement standard

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Information benefice-risque

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Age, grade, pT & HR status

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Pas de traitement standard

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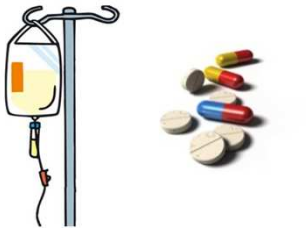
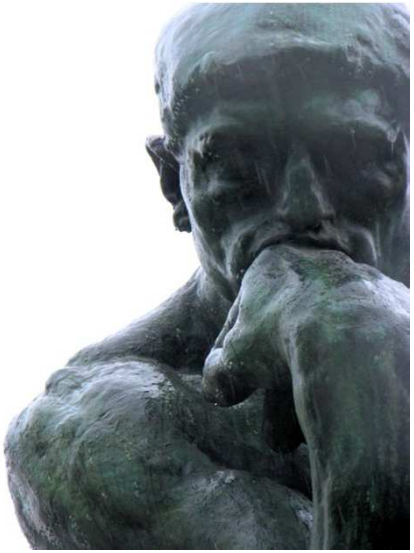
Age, grade, pT & HR status



Traitements systemiques

Conclusions

TTT RLH ≠ TTT primaire ?



Conclusions

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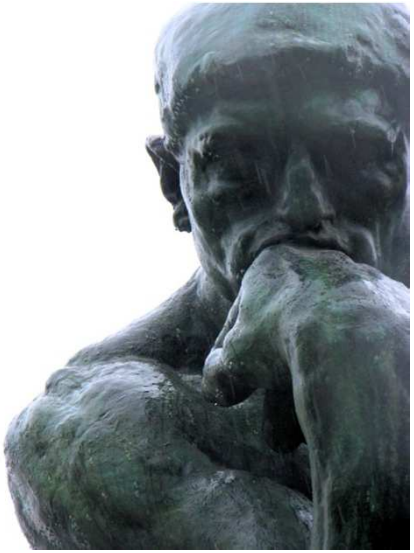
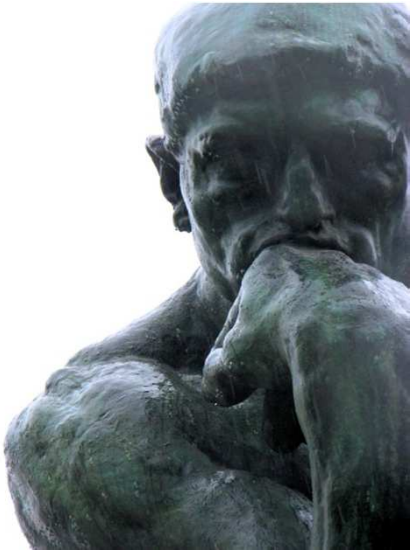


Mêmes buts:

- ✓ Contrôle local
- ✓ Survie globale
- ✓ Résultats cosmetiques

Conclusions



TTT RLH ≠ TTT primaire ?

Mêmes buts:

- ✓ Contrôle local
- ✓ Survie globale
- ✓ Résultats cosmetiques

Impact du:

- ✓ 2nd évènement sur évolution clinique (VR ou NT)
- ✓ TTT initial sur TTT de la rechute

Merci de votre attention