Chemoradiation in Carcinoma Larynx

Panelists

Aditi Agrawal JNMCH, AMU, Aligarh

Chebolu Rushikesh Goud, Rangaraya Medical College,Kakinada

Aditya Ambesh, RMLIMS Hospital, Lucknow

Drashti Patel, GCRI, Ahmedabad

Chintam Datta Sindhu,Sri Shankara Cancer Hospital and Research Centre, Bengaluru

Moderator

Cessal Thommachan Kainickal ,RCC, Trivandrum

Ca Larynx-III&IV

Stage III	T3	N0	M0
	T1-T3	N1	M0
Stage IVA	T1-T3	N2	M0
	T4a	N0-N2	M0
Stage IVB	Any T	N3	M0
	T4b	Any N	M0
Stage IVC	Any T	Any N	M1

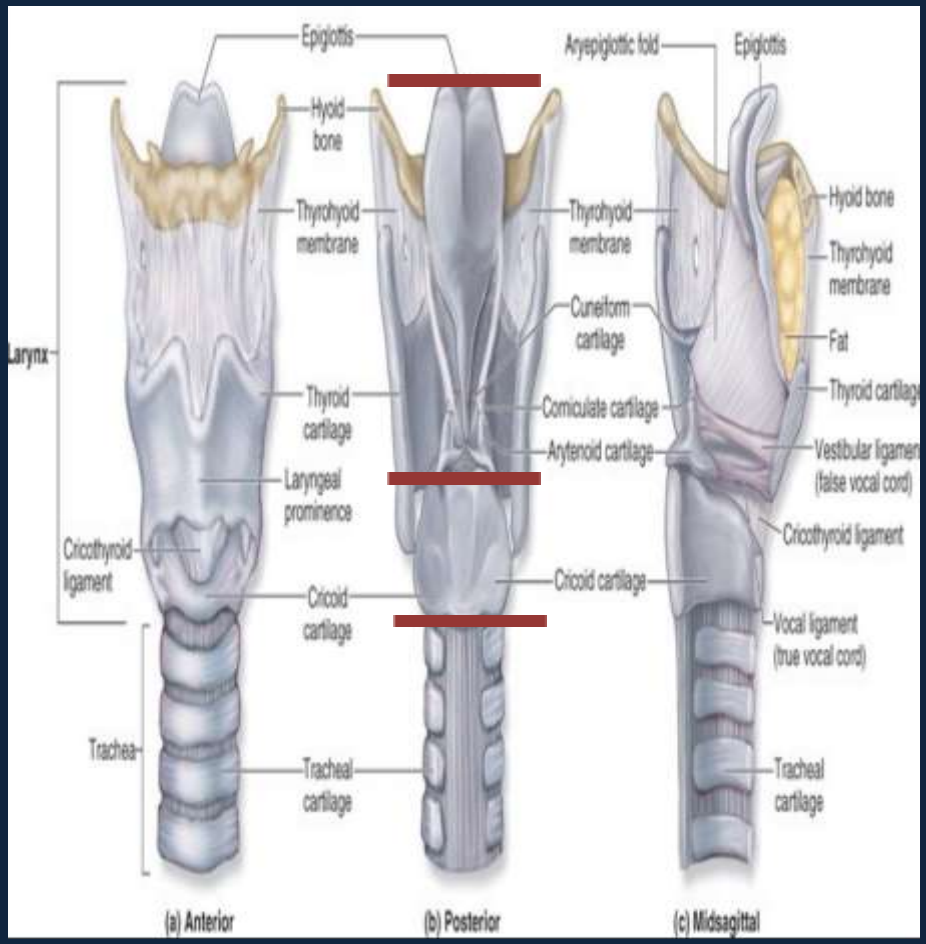
What constitute T3 disease in Ca Larynx?

Dr Aditi Agrawal

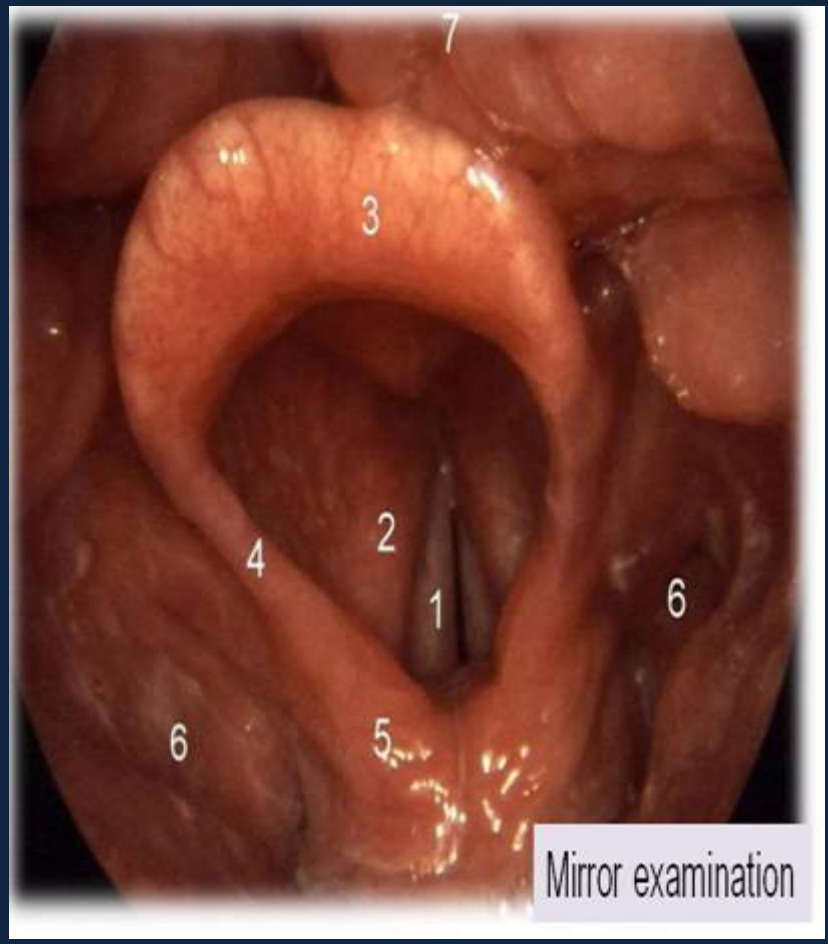
T3 Larynx - 5 features

- Hemi larynx fixity
- Post cricoid +
- Paraglottic involvement
- Preepiglotic space
- Inner cortex +

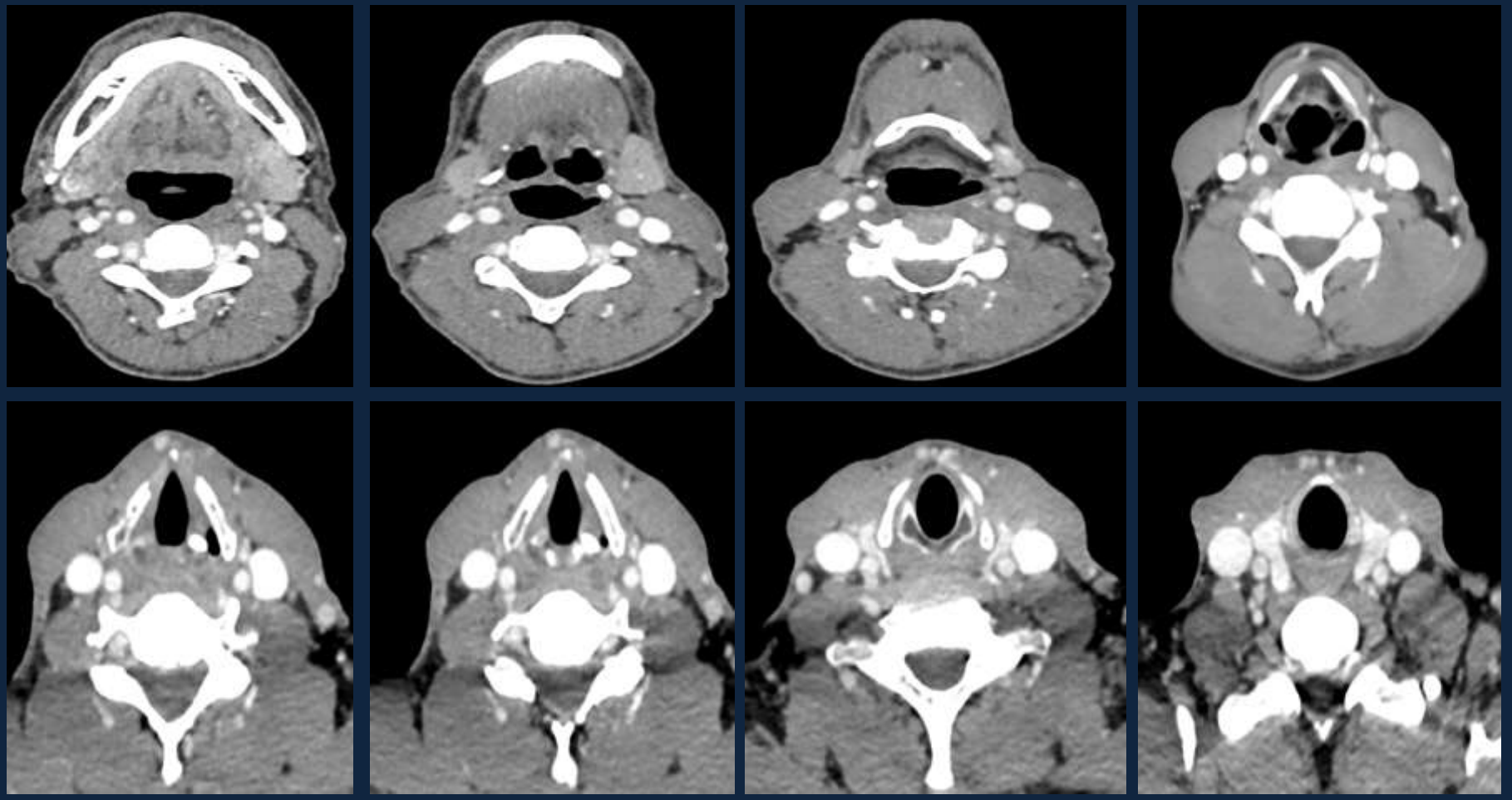
Anatomy



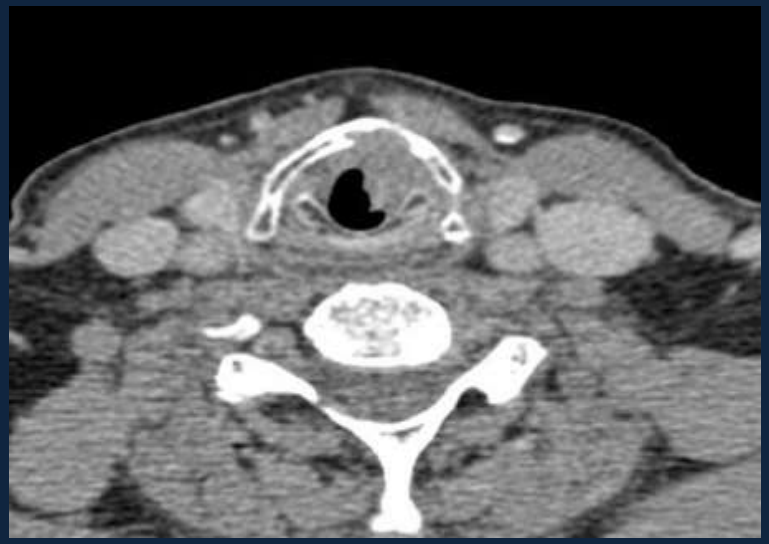
Mirror examination

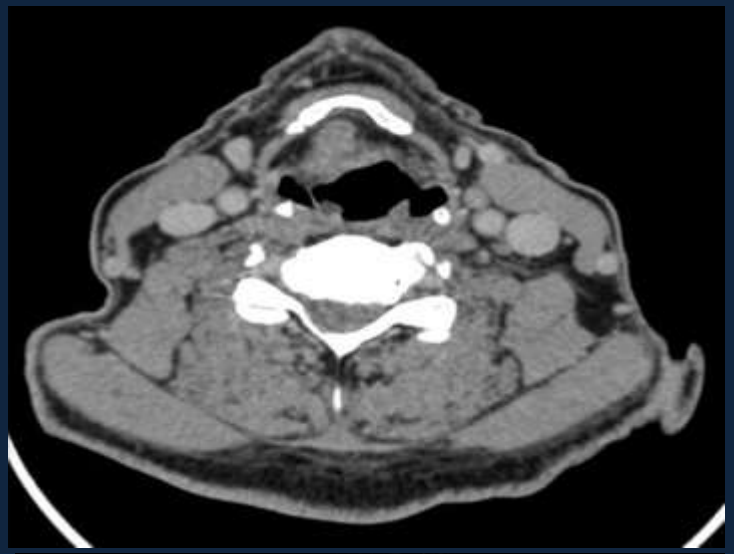


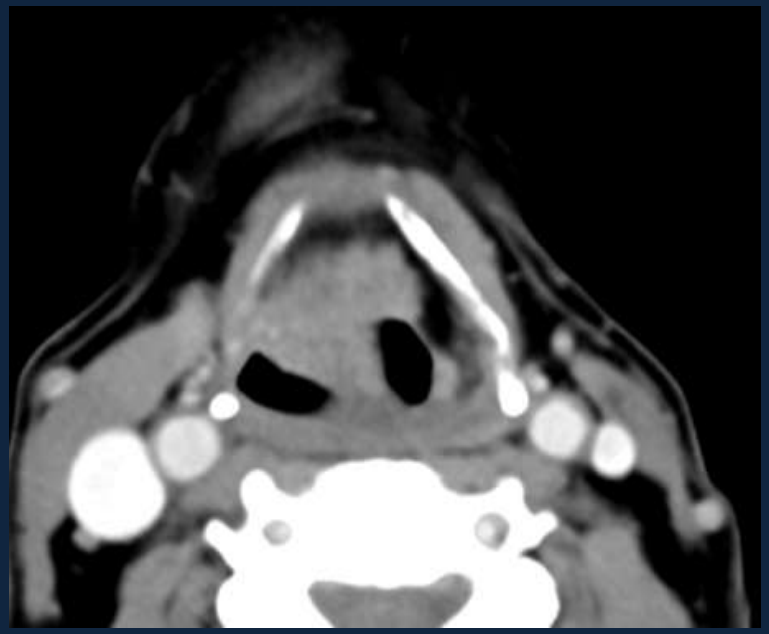
CT scan larynx



T3 disease



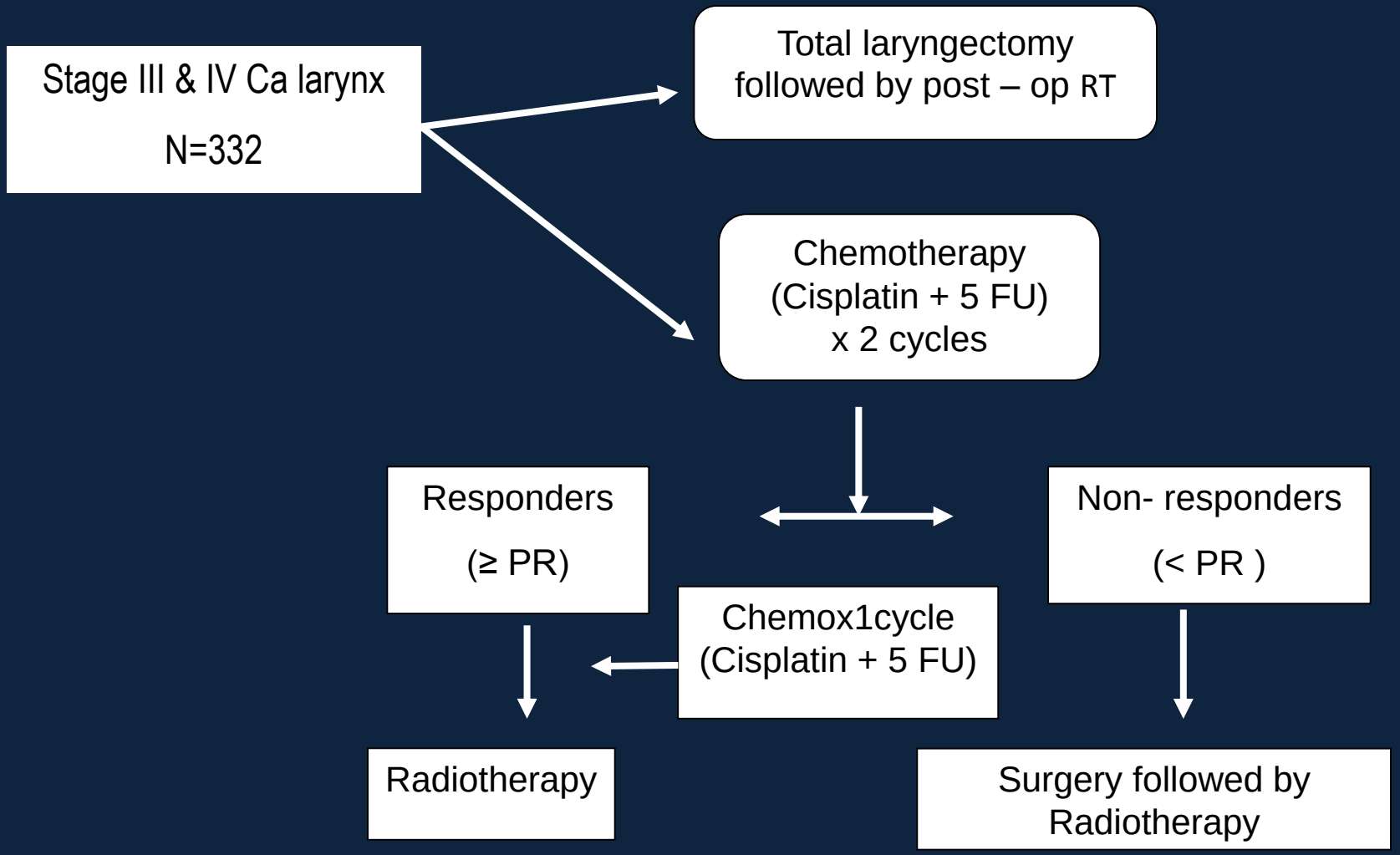




Evolution of Treatment in T3 Ca Larynx

Dr Chebolu Rushikesh Goud

Study design of VA Trial



NEJM 1991;324:1685-90

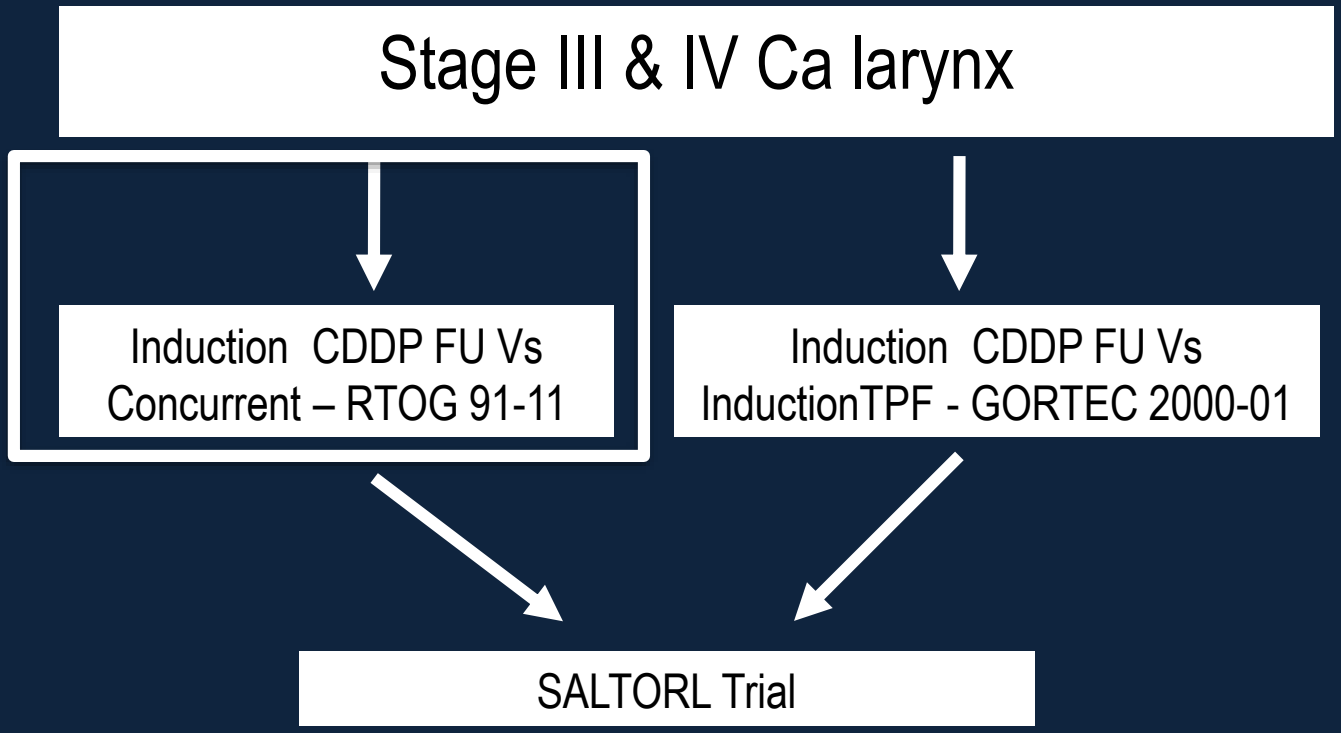
Results -33 months

- 2yr survival was 68% for both groups (p=0.9846)
- Laryngeal preservation was 64%

NACT improves Organ preservation. No OS benefit

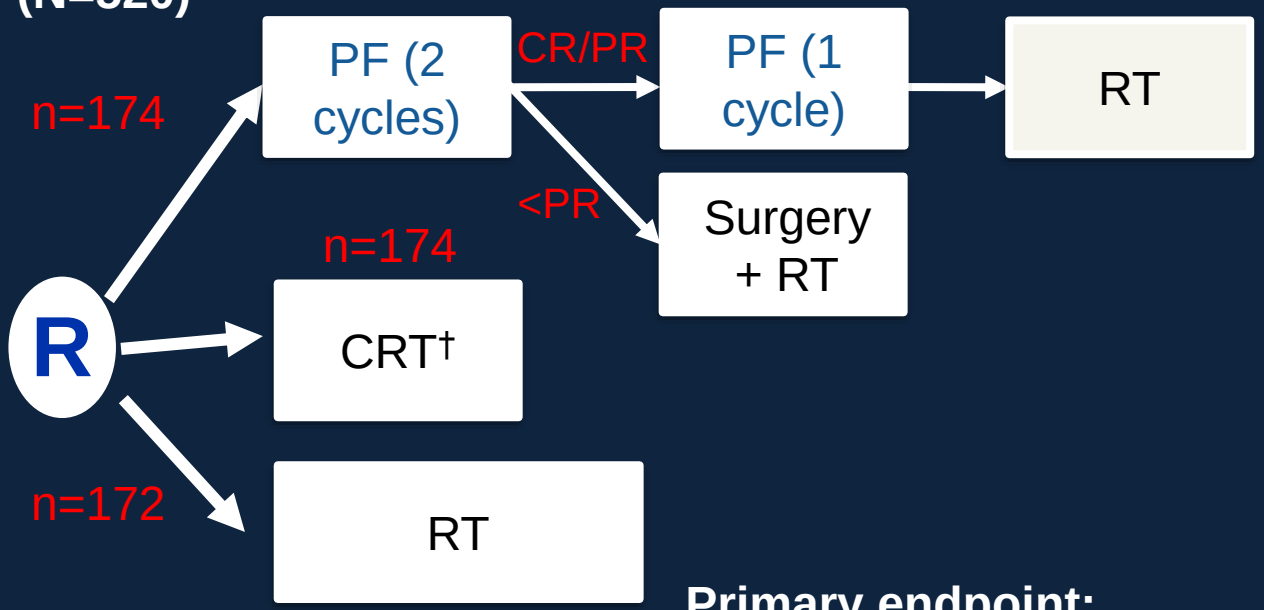
NEJM 1991;324:1685-90

Further research



RTOG 91-11: Study design

Patients with Stage III or IV glottic or supraglottic SCCHN curable with laryngectomy and RT (N=520)*



Primary endpoint:
Laryngectomy-free survival (LFS)

*T1 primaries and high-volume T4 primaries (invasion >1 cm into the base of tongue or penetration through cartilage) were excluded
†Cisplatin 100 mg/m^2 q3w + RT;
CR, complete response; PF, cisplatin 100 mg/m^2 day 1 + 5-FU 1,000 mg/m^2/day for 5 days; PR, partial response

Forastiere AA, et al. J Clin Oncol 2013;31:845–852

The NEW ENGLAND JOURNAL of MEDICINE

ESTABLISHED IN 1812 NOVEMBER 27, 2003 VOL. 349 NO. 22

Concurrent Chemotherapy and Radiotherapy for Organ Preservation in Advanced Laryngeal Cancer

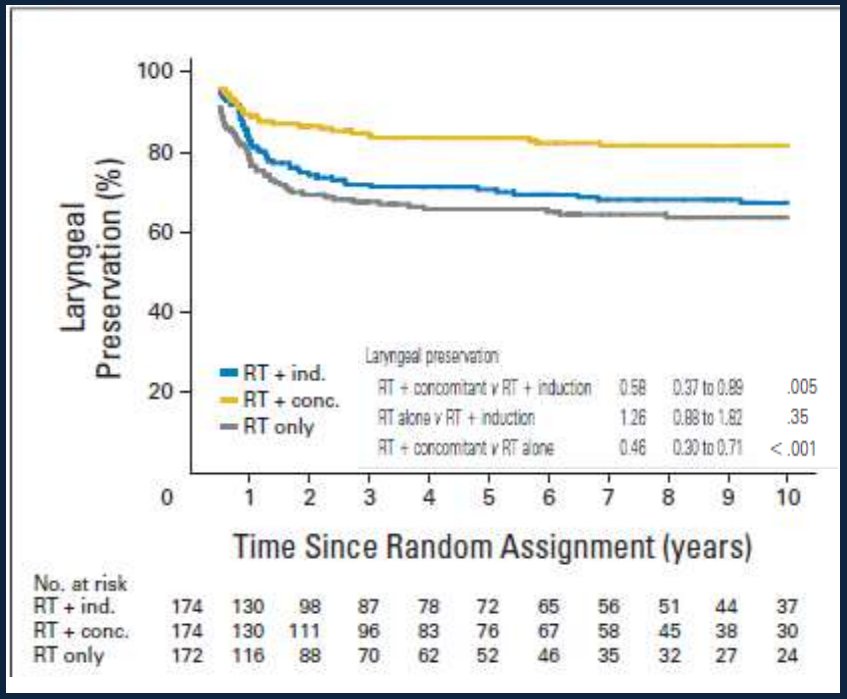
Arlene A. Forastiere, M.D., Helmuth Goepfert, M.D., Moshe Maor, M.D., Thomas F. Pajak, Ph.D., Randal Weber, M.D., William Morrison, M.D., Bonnie Glisson, M.D., Andy Trotti, M.D., John A. Ridge, M.D., Ph.D., Clifford Chao, M.D., Glen Peters, M.D., Ding-Jen Lee, M.D., Ph.D., Andrea Leaf, M.D., John Ensley, M.D., and Jay Cooper, M.D.

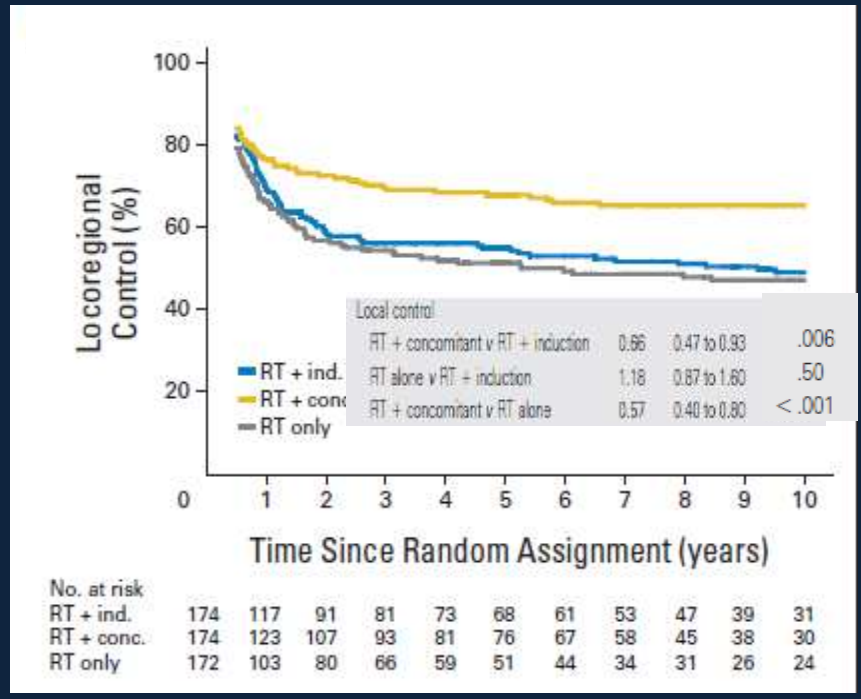
VOLUME 31 · NUMBER 7 · MARCH 1 2013

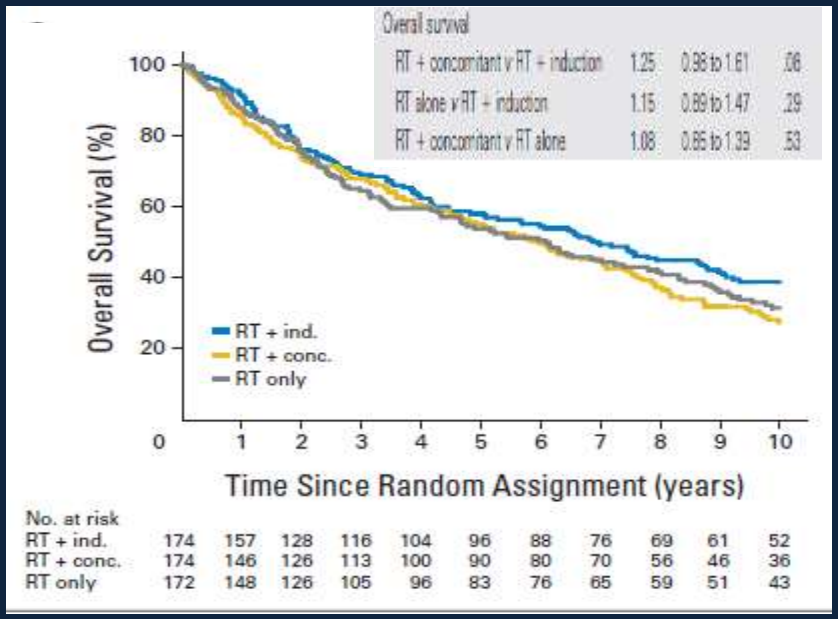
JOURNAL OF CLINICAL ONCOLOGY ORIGINAL REPORT

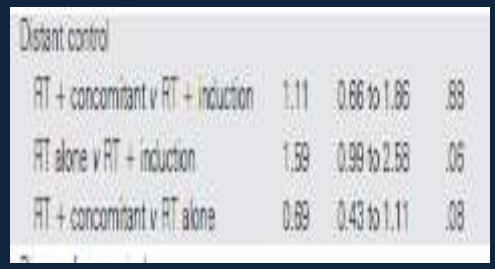
Long-Term Results of RTOG 91-11: A Comparison of Three Nonsurgical Treatment Strategies to Preserve the Larynx in Patients With Locally Advanced Larynx Cancer

Arlene A. Forastiere, Qiang Zhang, Randal S. Weber, Moshe H. Maor, Helmuth Goepfert, Thomas F. Pajak, William Morrison, Bonnie Glisson, Andy Trotti, John A. Ridge, Wade Thorstad, Henry Wagner, John F. Ensley, and Jay S. Cooper







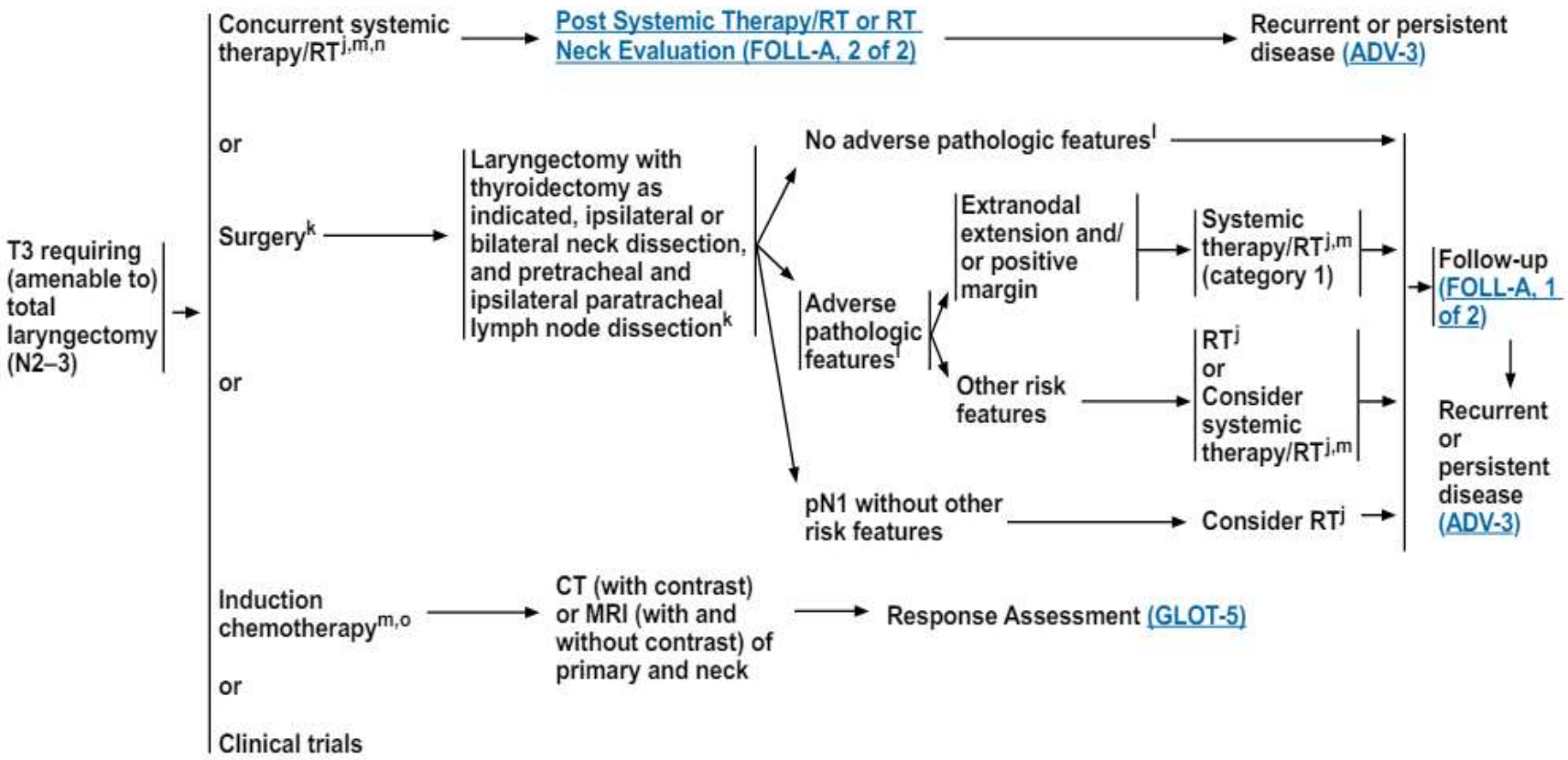


J Clin Oncol 31:845-852. © 2012 by American Society of Clinical Oncology

National Comprehensive Cancer Network®

NCCN Guidelines Version 4.2024
Cancer of the Glottic Larynx

NCCN Guidelines Index
Table of Contents
Discussion



ELMER PRESS

Review

World J Oncol. 2018;9(2):39-45

Current Status of Organ Preservation in Carcinoma Larynx

Tapesh Bhattacharyya[a], Cessal Thommachan Kainickal[b, c]

Criteria for CCRT

Dr Drashti Patel

Concurrent ChemoRT

- Performance status 0,1
- Age not more than 70 yrs.
- Good renal function
- No evidence of through and through cartilage destruction
- No aspiration
- Good social support

Radiotherapy and Oncology 92 (2009) 4–14

Contents lists available at ScienceDirect

Radiotherapy and Oncology

journal homepage: www.thegreenjournal.com

Meta analysis

Meta-analysis of chemotherapy in head and neck cancer (MACH-NC): An update on 93 randomised trials and 17,346 patients

Jean-Pierre Pignon [a,*], Aurélie le Maître [a], Emilie Maillard [a], Jean Bourhis [b], on behalf of the MACH-NC Collaborative Group [1]

[a] Department of Biostatistics and Epidemiology, Institut Gustave-Roussy, Villejuif, France
[b] Department of Radiotherapy, Institut Gustave-Roussy, Villejuif, France

1994-2000, Paimary end point- OS
Median follow up 5.6 yrs

Editorial

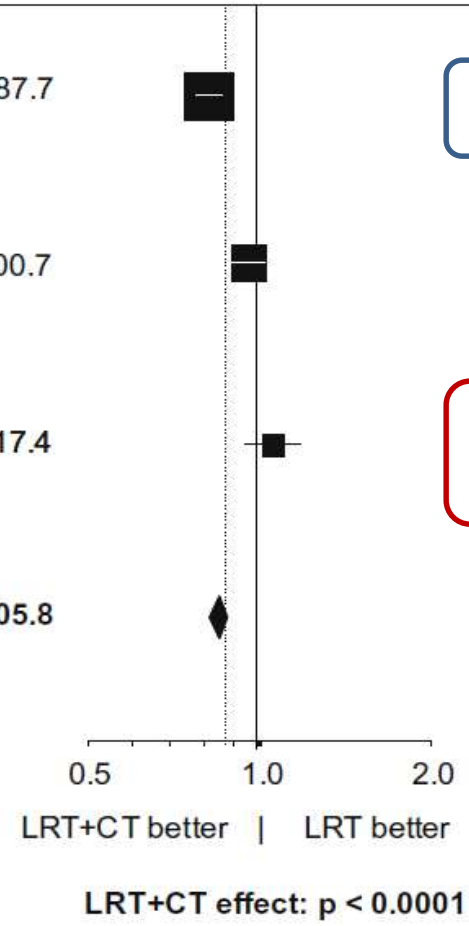
Chemoradiotherapy of head and neck cancer – Can the bumble bee fly?

Jens Overgaard *

Department of Experimental Clinical Oncology, Aarhus University Hospital, Aarhus, Denmark

HR For death

Timing	No. Deaths / No. Entered LRT+CT	LRT	O-E	Variance	Hazard Ratio	HR [95% CI]
Concomitant	3171/4824	3389/4791	-326.4	1587.7		0.81 [0.78;0.86]
Induction	1877/2740	1813/2571	-40.0	900.7		0.96 [0.90;1.02]
Adjuvant	631/1244	661/1323	17.9	317.4		1.06 [0.95;1.18]
Total	**5679/8808**	**5863/8685**	**-348.5**	**2805.8**		**0.88 [0.85;0.92]**



Test for heterogeneity: $\chi^2_{107} = 179.8$ p < 0.0001

Test for interaction: $\chi^2_2 = 26.60$ p < 0.0001

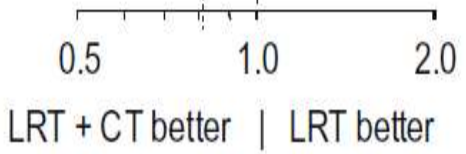
$I^2 = 41\%$

Radiotherapy and Oncology 92 (2009) 4–14

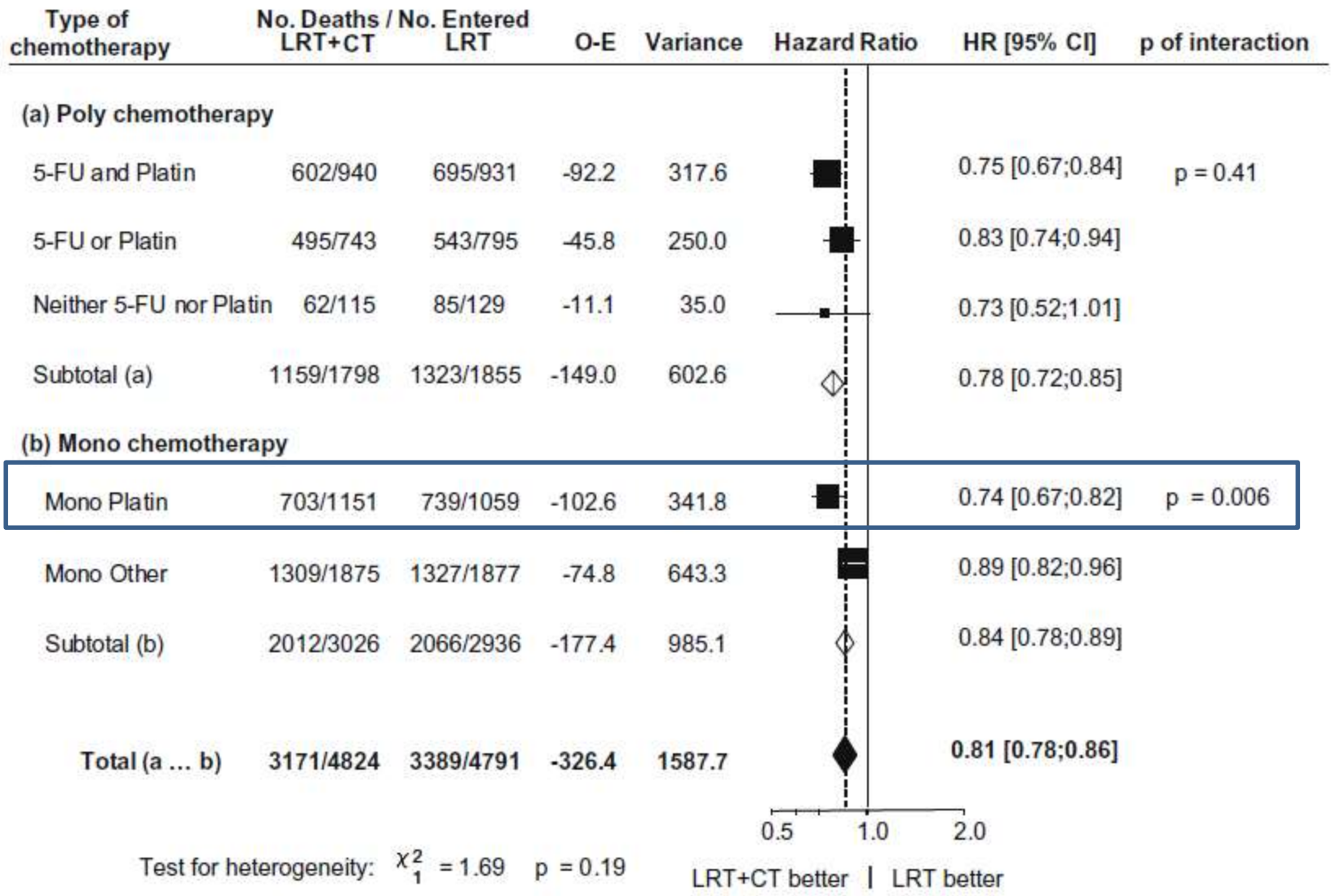
Category	No. Deaths / No. Entered LRT + CT	LRT	O-E	Variance	Hazard Ratio	Absolute difference at 5 years ± sd
Age						
Less than 50	803/1296	860/1288	-107.6	386.9		9.8 ± 2.1
51-60	1069/1645	1198/1661	-136.4	539.7		7.8 ± 1.8
61-70	972/1368	988/1330	-56.2	457.8		3.0 ± 1.9
71 or over	273/356	260/336	-3.5	114.7		-0.7 ± 3.9

p_inter = 0.02

p_trend = 0.003



Radiotherapy and Oncology 92 (2009) 4–14



Radiotherapy and Oncology 92 (2009) 4–14

Conclusions –MACH-NC

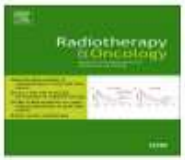
- CCRT is superior to RT alone -OS&LCR
- Absolute benefit is 6.5 % at 5 yrs
- Induction chemo is not beneficial(Non taxane based)
- Maximum benefit of chemo in young pts
- Single agent is equivalent to combination
- Cisplatin is better than other agents

Radiotherapy and Oncology 156 (2021) 281–293

Contents lists available at ScienceDirect

Radiotherapy and Oncology

journal homepage: www.thegreenjournal.com



Original Article

Meta-analysis of chemotherapy in head and neck cancer (MACH-NC): An update on 107 randomized trials and 19,805 patients, on behalf of MACH-NC Group

Benjamin Lacas [a,b], Alexandra Carmel [a], Cécile Landais [a], Stuart J. Wong [c], Lisa Licitra [d], Jeffrey S. Tobias [e], Barbara Burtness [f], Maria Grazia Ghi [g], Ezra E.W. Cohen [h], Cai Grau [i], Gregory Wolf [j], Ricardo Hitt [k], Renzo Corvò [l], Volker Budach [m], Shaleen Kumar [n], Sarbani Ghosh Laskar [o], Jean-Jacques Mazeron [p], Lai-Ping Zhong [q], Werner Dobrowsky [r], Pirus Ghadjar [s], Carlo Fallai [t], Branko Zakotnik [u], Atul Sharma [v], René-Jean Bensadoun [w], Maria Grazia Ruo Redda [x], Séverine Racadot [y], George Fountzilas [z], David Brizel [aa], Paolo Rovea [ab], Athanassios Argiris [ac], Zoltán Takácsi-Nagy [ad], Ju-Whei Lee [ae], Catherine Fortpied [af], Jonathan Harris [ag], Jean Bourhis [b,ah], Anne Aupérin [a,b], Pierre Blanchard [a,b,ai,*], Jean-Pierre Pignon [a,b], on behalf of the MACH-NC Collaborative Group

- The primary endpoint was overall survival (OS)
- Event-free survival (EFS)
- Loco-regional failure (LRF)
- 120 day mortality
- Distant failure (DF)
- Cancer and no cancer mortality

LRT Vs LRT +Chemotherapy

Radiotherapy & Oncology 2021 Mar;156:281-293

Concomitant versus Induction chemotherapy

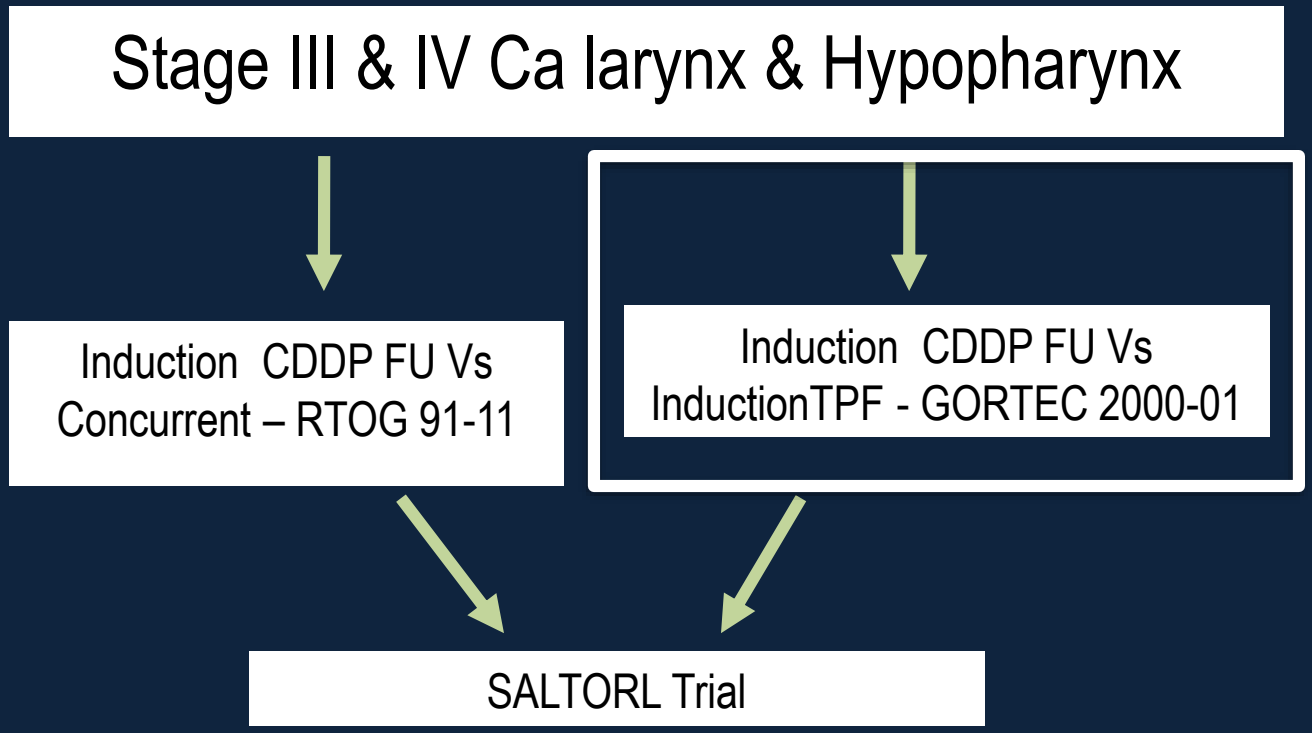
- N=1214;Median follow up – 9 years
- OS - HR = 0.84; absolute benefit of 6.2% at 5 years (p = 0.005)
- EFS- HR = 0.85 ;absolute benefit of 3.7% at 5 years (p = 0.008)
- LRF - HR = 0.86; absolute benefit of 5.8% at 5 years (p = 0.01)

Radiotherapy & Oncology 2021 Mar;156:281-293

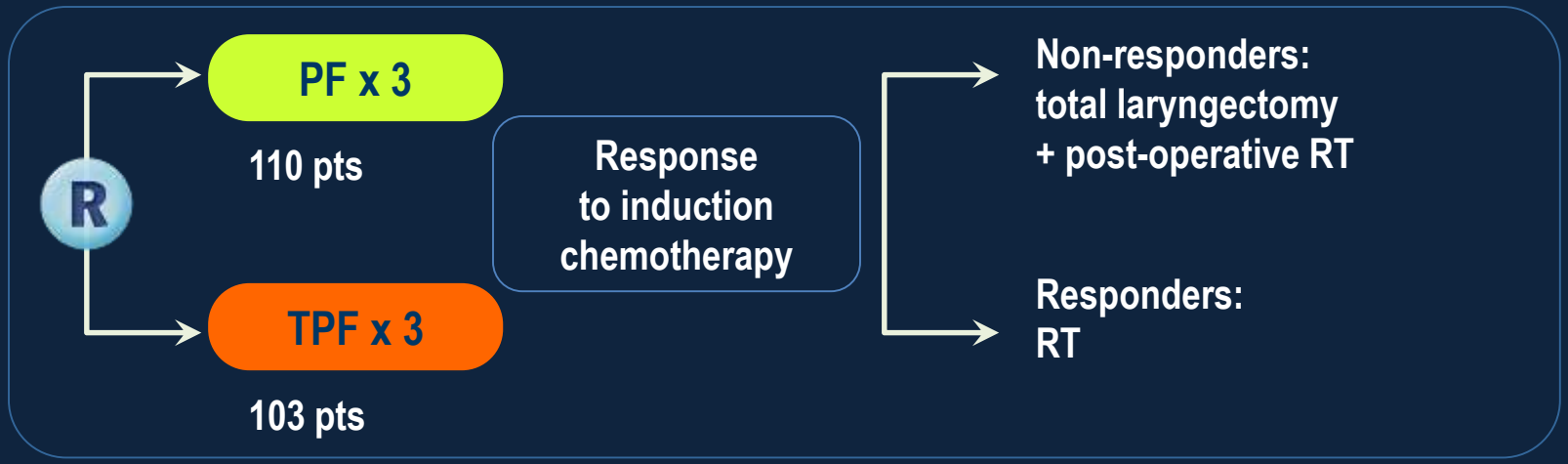
Role for Induction chemotherapy in Ca Larynx?

Dr Aditya Ambesh

Further research



GORTEC 2000-01 laryngeal preservation trial



Principal objective:

laryngeal preservation

Secondary objectives:

overall survival, progression-free survival, toxicity

Calais G et al. ASCO 2006, ECCO 2007

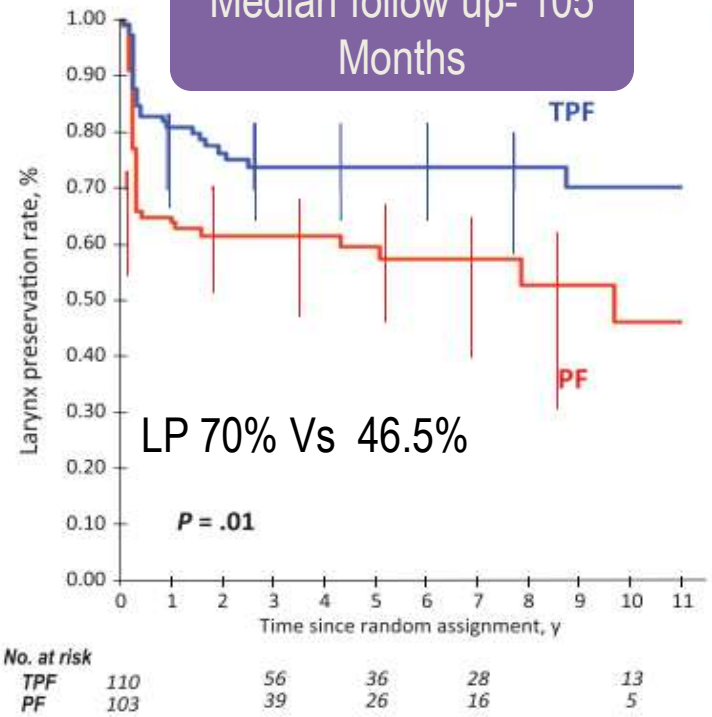
ARTICLE

Long-Term Results of a Multicenter Randomized Phase III Trial of Induction Chemotherapy With Cisplatin, 5-fluorouracil, ± Docetaxel for Larynx Preservation

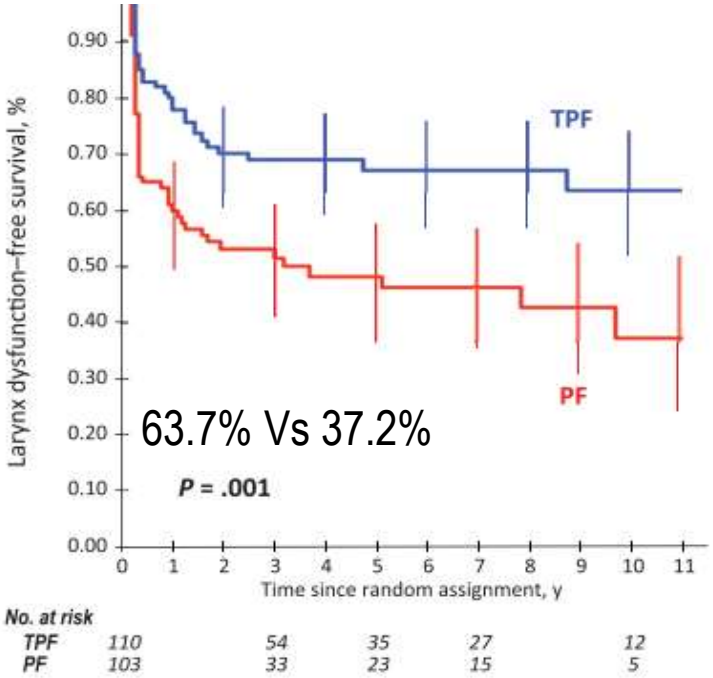
Guillaume Janoray, Yoann Pointreau, Pascal Garaud, Sophie Chapet, Marc Alfonsi, Christian Sire, Eric Jadaud, Gilles Calais

Affiliations of authors: Centre Hospitalier Régional et Universitaire, Henry Kaplan Center, Clinique d'Oncologie et de Radiothérapie, Tours, France (GJ, YP, PG, SC, GC); Université François Rabelais de Tours, France (GJ, GC); Clinique Sainte Catherine, Avignon, France (MA); Centre Hospitalier de Lorient, Lorient, France (CS); Centre Paul Papin, Angers, France (EJ).

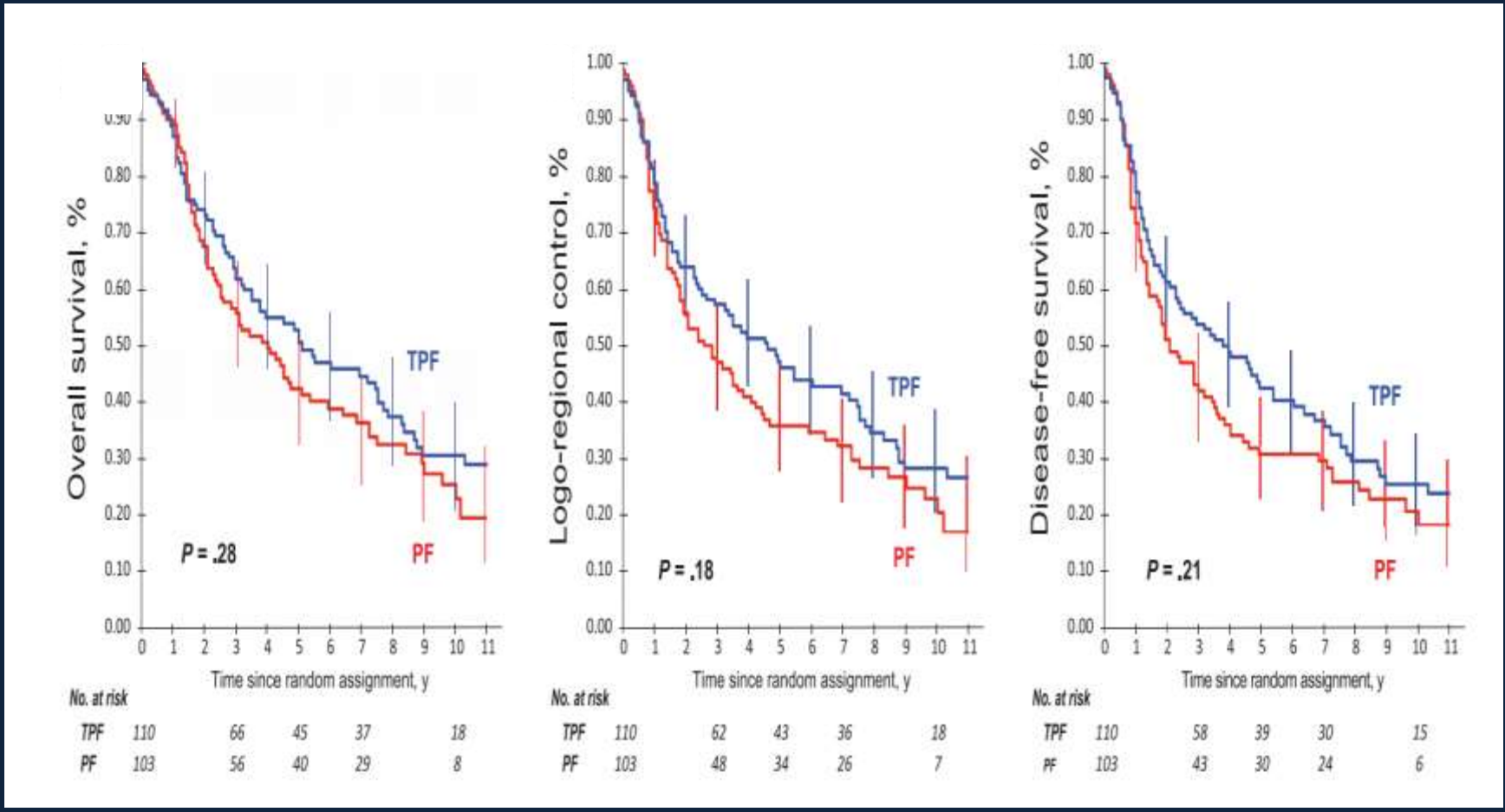
Median follow up- 105 Months



JNCI J Natl Cancer Inst (2016) 108(4): djv368

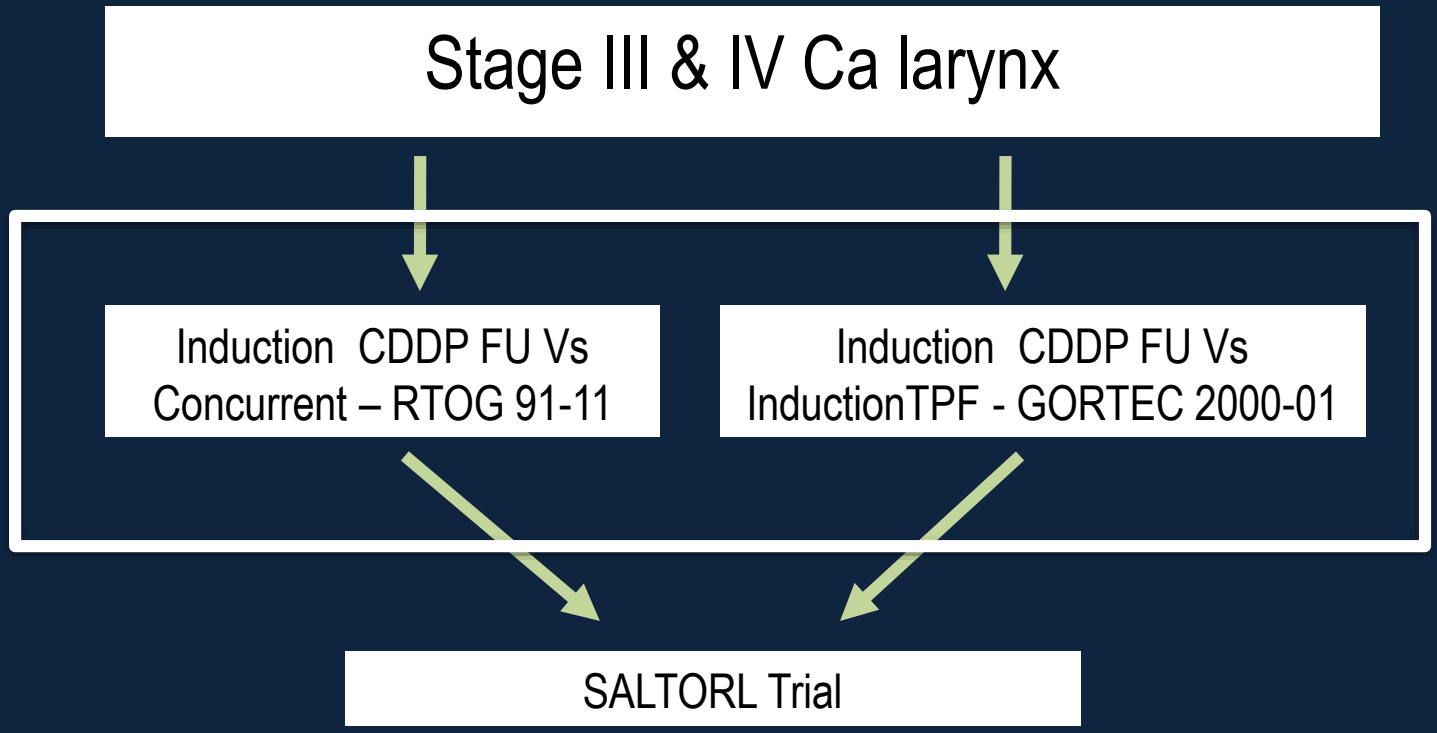


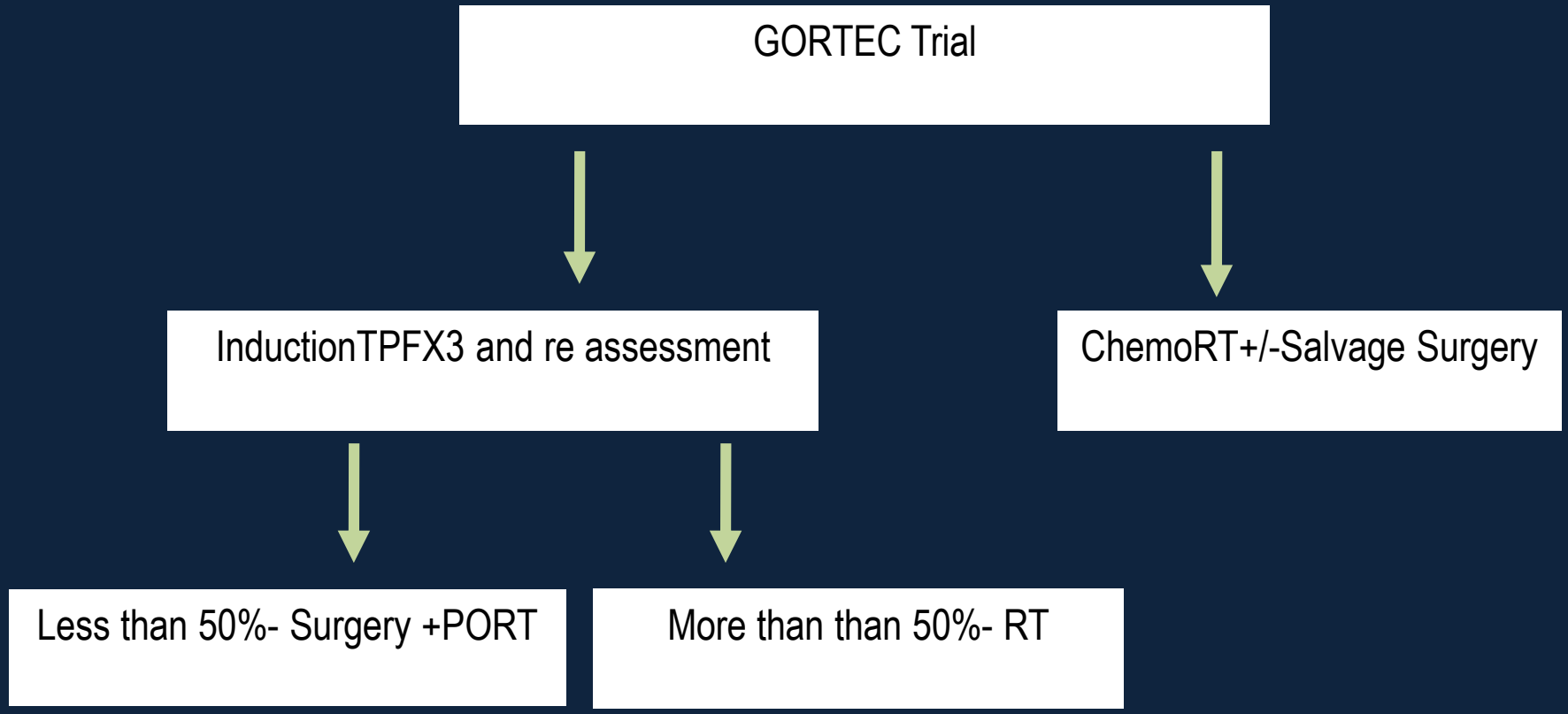
GORTEC 2000-01



JNCI J Natl Cancer Inst (2016) 108(4): djv368

Further research





https://clinicaltrials.gov/ct2/show/NCT03340896

Radiotherapy and Oncology 118 (2016) 238–243

Contents lists available at ScienceDirect

Radiotherapy and Oncology

journal homepage: www.thegreenjournal.com

Systematic review

Induction chemotherapy followed by concurrent radio-chemotherapy versus concurrent radio-chemotherapy alone as treatment of locally advanced squamous cell carcinoma of the head and neck (HNSCC): A meta-analysis of randomized trials

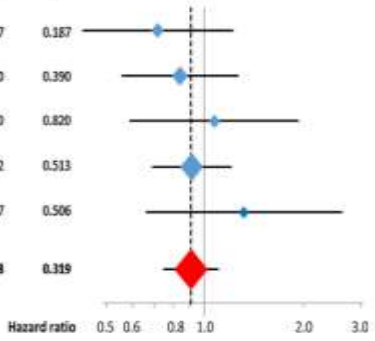
Wilfried Budach [a], Edwin Bölke [a], Kai Kammers [b], Peter Arne Gerber [d], Klaus Orth [c], Stephan Gripp [a], Christiane Matuschek [a,*]

[a] Medical Faculty, Department of Radiation Oncology, Heinrich Heine University, Dusseldorf, Germany; [b] Department of Biostatistics, Johns Hopkins Bloomberg School of Public Health, Baltimore, USA; [c] Medical Faculty, Department of General, Visceral, and Thoracic Surgery, Asklepios Harz Hospitals, Goslar; and [d] Medical Faculty, Department of Dermatology, Heinrich Heine University, Dusseldorf, Germany

TPF→RT-CHX vs. RT-CHX in locally advanced head and neck cancer

Meta-analysis of randomized controlled trials: **PFS**

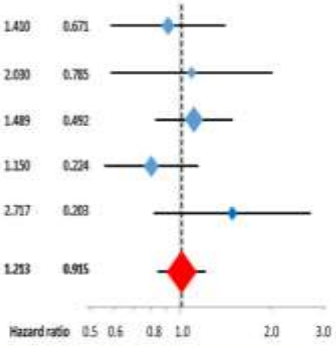
Reference	n *	HR	95% CL-	95% CL+	p
Paccagnella et al.[16]	101	0.718	0.424	1.217	0.187
Cohen et al.[19]	273	0.840	0.560	1.260	0.390
Haddad et al.[14]	145	1.070	0.590	1.920	0.820
Hitt et al.[15]	283	0.912	0.692	1.202	0.513
Takácsi-Nagy et al.[18]	60	1.315	0.663	2.607	0.506
Total	**862**	**0.908**	**0.751**	**1.098**	**0.319**



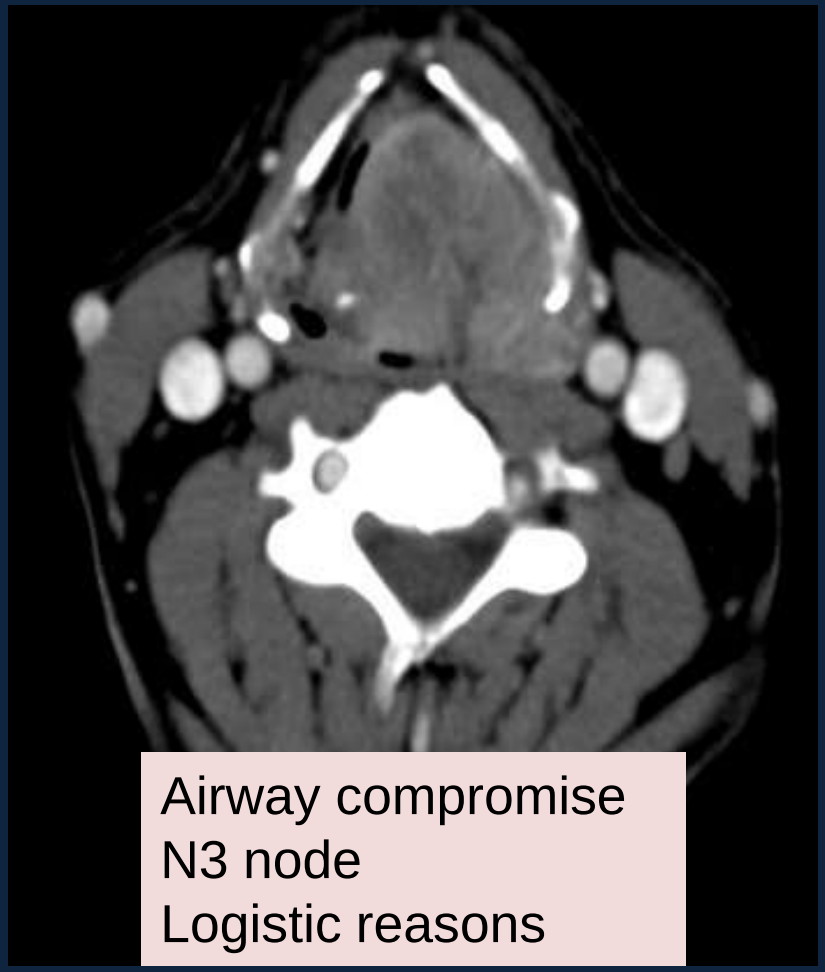
TPF→RT-CHX vs. RT-CHX in locally advanced head and neck cancer

Meta-analysis of randomized controlled trials: **Overall Survival**

Reference	n *	HR	95% CL-	95% CL+	p
Cohen et al.[19]	273	0.910	0.590	1.400	0.671
Haddad et al.[14]	145	1.090	0.590	2.030	0.785
Hitt et al.[15]	283	1.109	0.825	1.489	0.492
Paccagnella et al. Ghi et al.[20]	258	0.800	0.560	1.150	0.224
Takácsi-Nagy et al.[18]	63	1.490	0.817	2.717	0.203
Total	**1022**	**1.010**	**0.841**	**1.213**	**0.915**



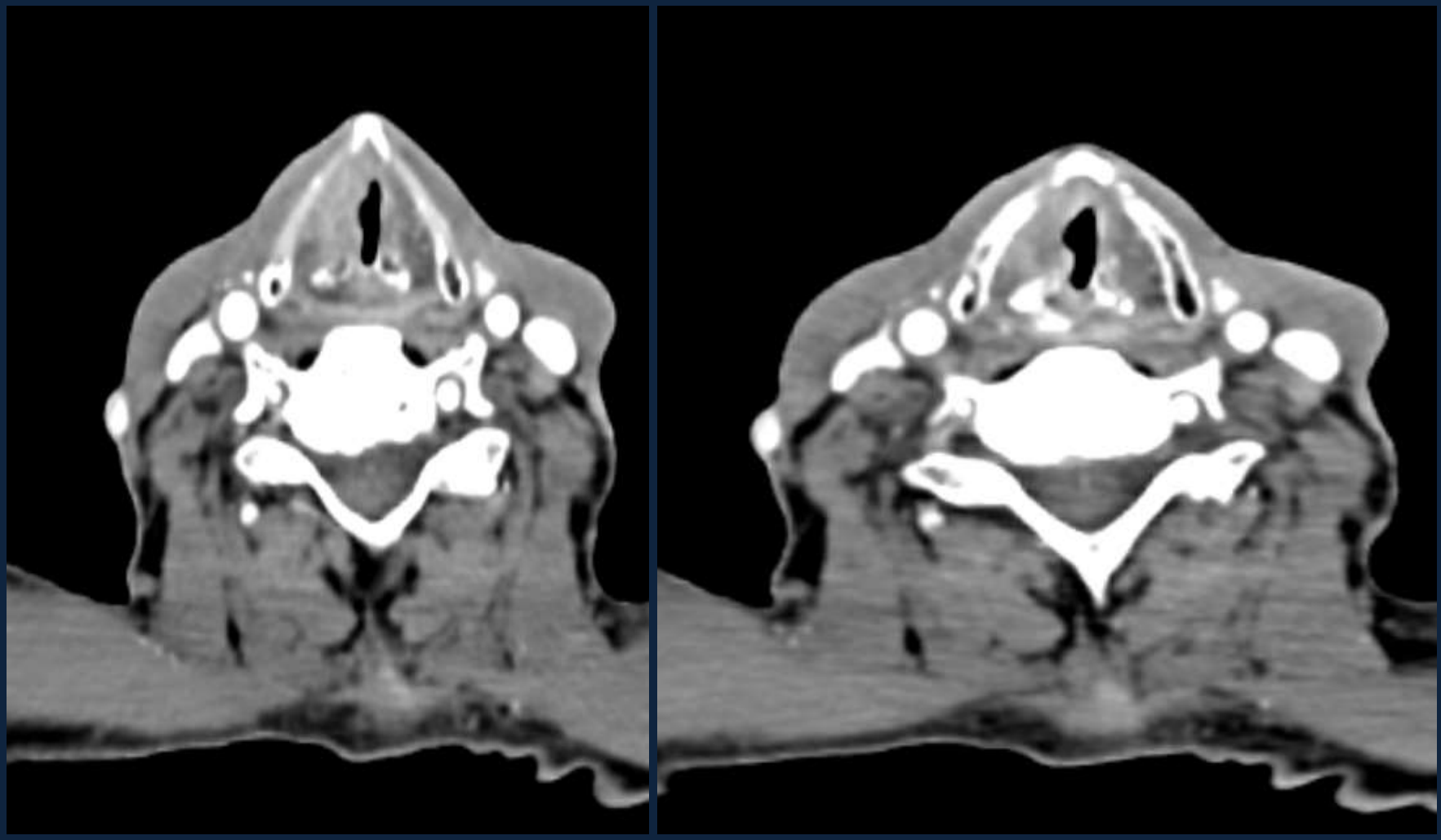
When to consider Induction Chemotherapy?



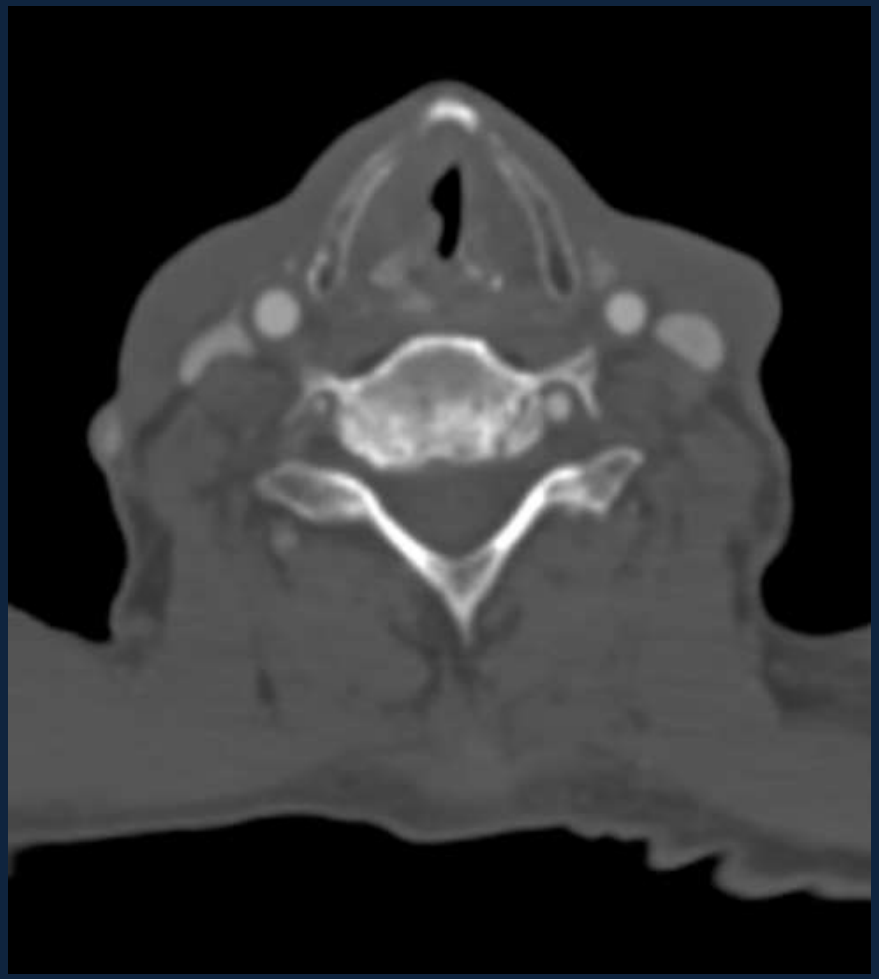
Airway compromise
N3 node
Logistic reasons

ChemoRT in Ca Larynx – Case discussion

63 yrs. PS-1 T3 Ca Larynx
CCT-63,No comorbidities, good social support



Ca Larynx –T3



Ca Larynx –T3

Dose and volumes-T3N0 Larynx

Dr Aditi Agrawal

Radiotherapy and Oncology 126 (2018) 3–24

Contents lists available at ScienceDirect

Radiotherapy and Oncology

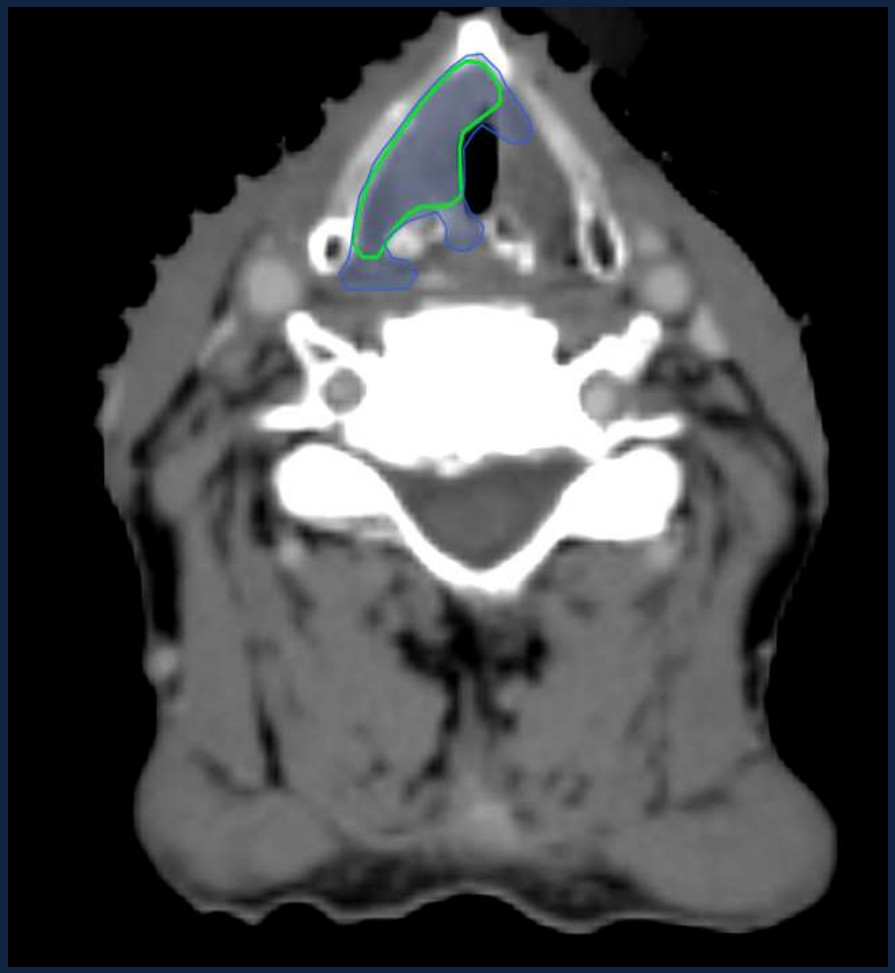
journal homepage: www.thegreenjournal.com

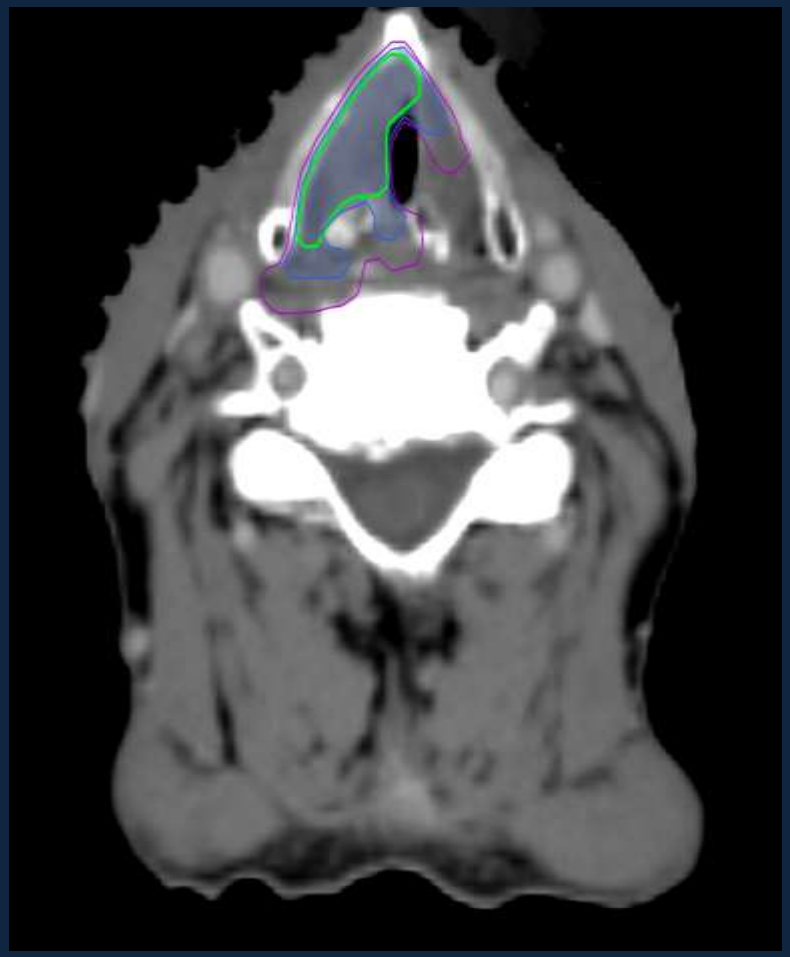
International Guideline

Delineation of the primary tumour Clinical Target Volumes (CTV-P) in laryngeal, hypopharyngeal, oropharyngeal and oral cavity squamous cell carcinoma: AIRO, CACA, DAHANCA, EORTC, GEORCC, GORTEC, HKNPCSG, HNCIG, IAG-KHT, LPRHHT, NCIC CTG, NCRI, NRG Oncology, PHNS, SBRT, SOMERA, SRO, SSHNO, TROG consensus guidelines

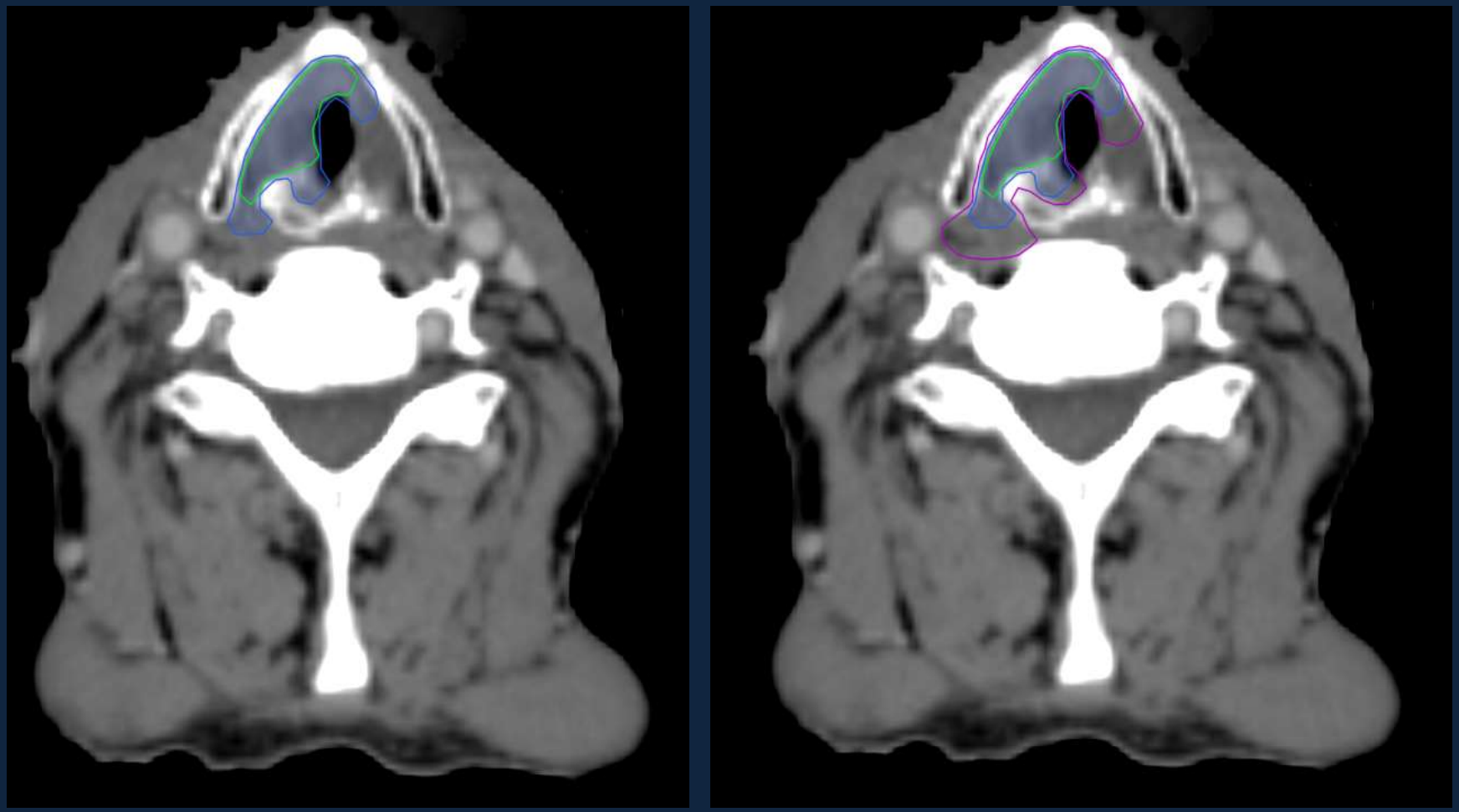
Vincent Grégoire [a,*], Mererid Evans [b], Quynh-Thu Le [c], Jean Bourhis [d], Volker Budach [e], Amy Chen [f], Abraham Eisbruch [g], Mei Feng [h], Jordi Giralt [i], Tejpal Gupta [j], Marc Hamoir [k], Juliana K. Helito [l], Chaosu Hu [m], Keith Hunter [n], Jorgen Johansen [o], Johannes Kaanders [p], Sarbani Ghosh Laskar [j], Anne Lee [q], Philippe Maingon [r], Antti Mäkitie [s], Francesco Micciche' [t], Piero Nicolai [u], Brian O'Sullivan [v], Adela Poitevin [w], Sandro Porceddu [x], Krzysztof Składowski [y], Silke Tribius [z], John Waldron [v], Joseph Wee [aa], Min Yao [ab], Sue S. Yom [ac], Frank Zimmermann [ad], Cai Grau [ae]

CTVp1&p2

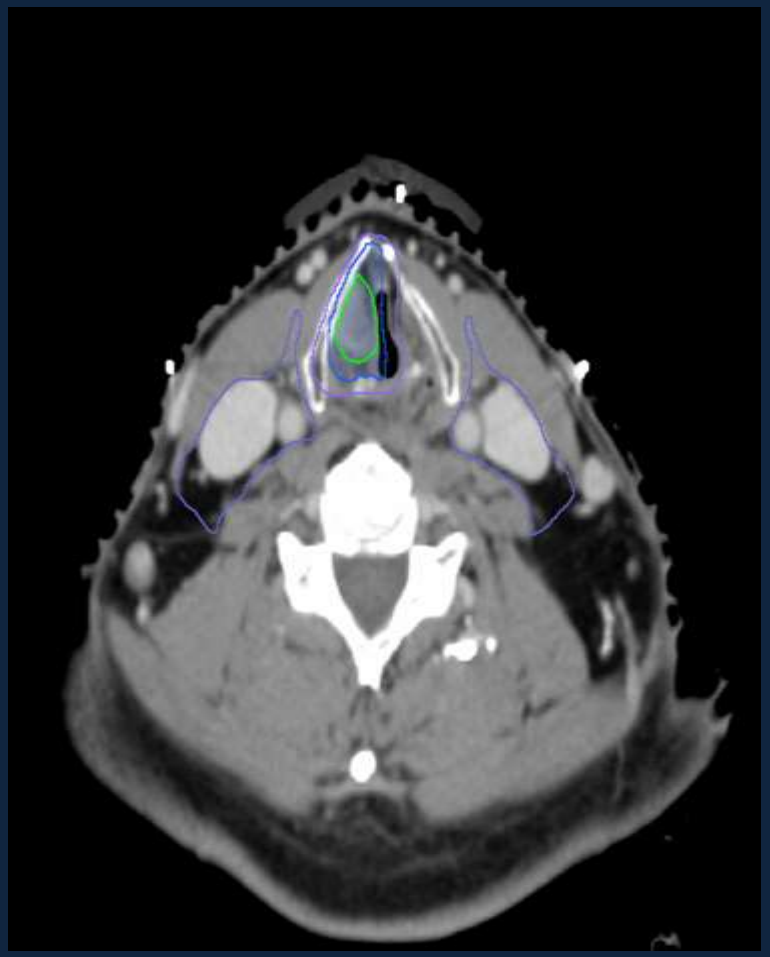




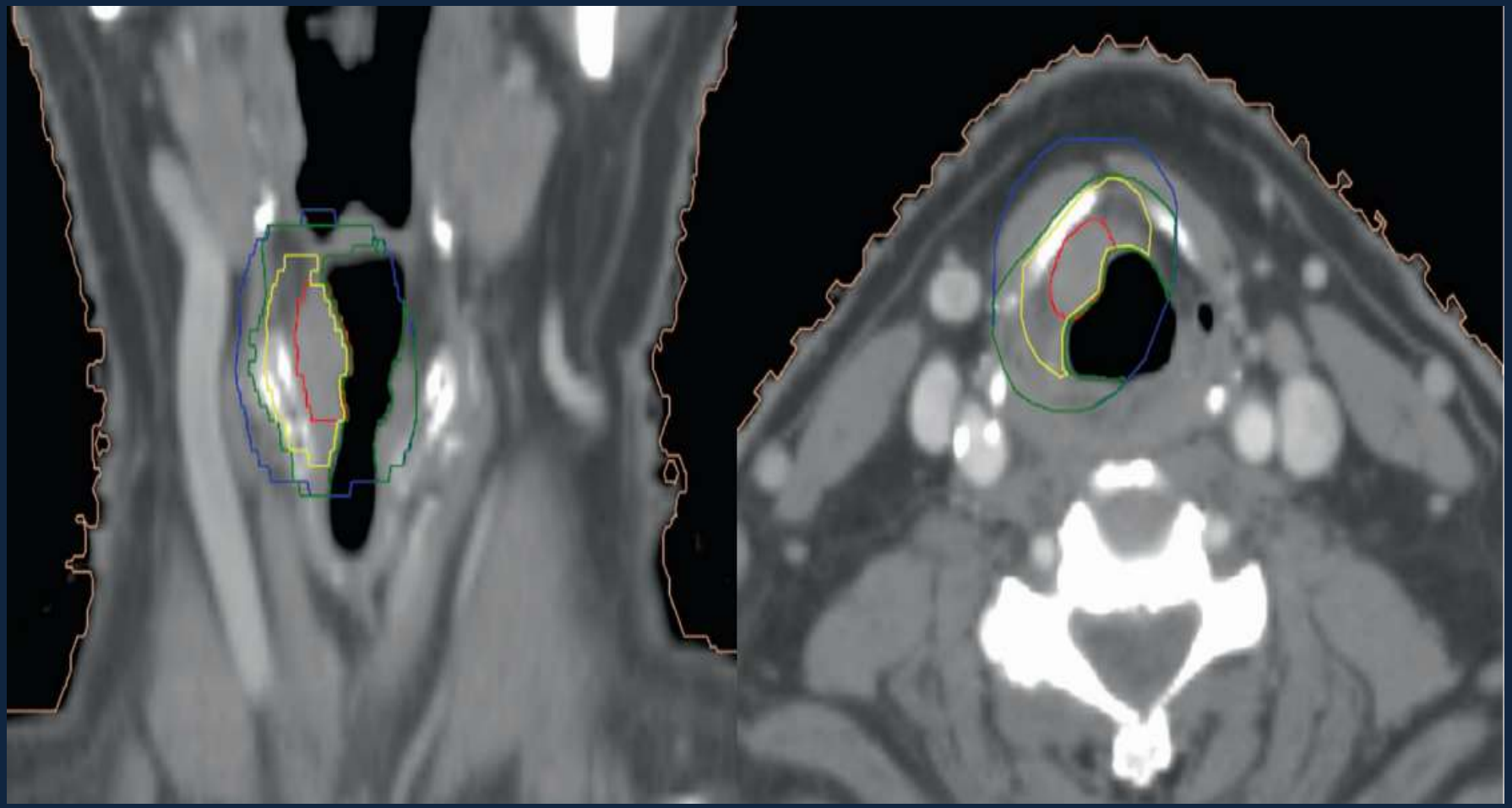
CTVp1&p2



CTVn2



T3 SGL

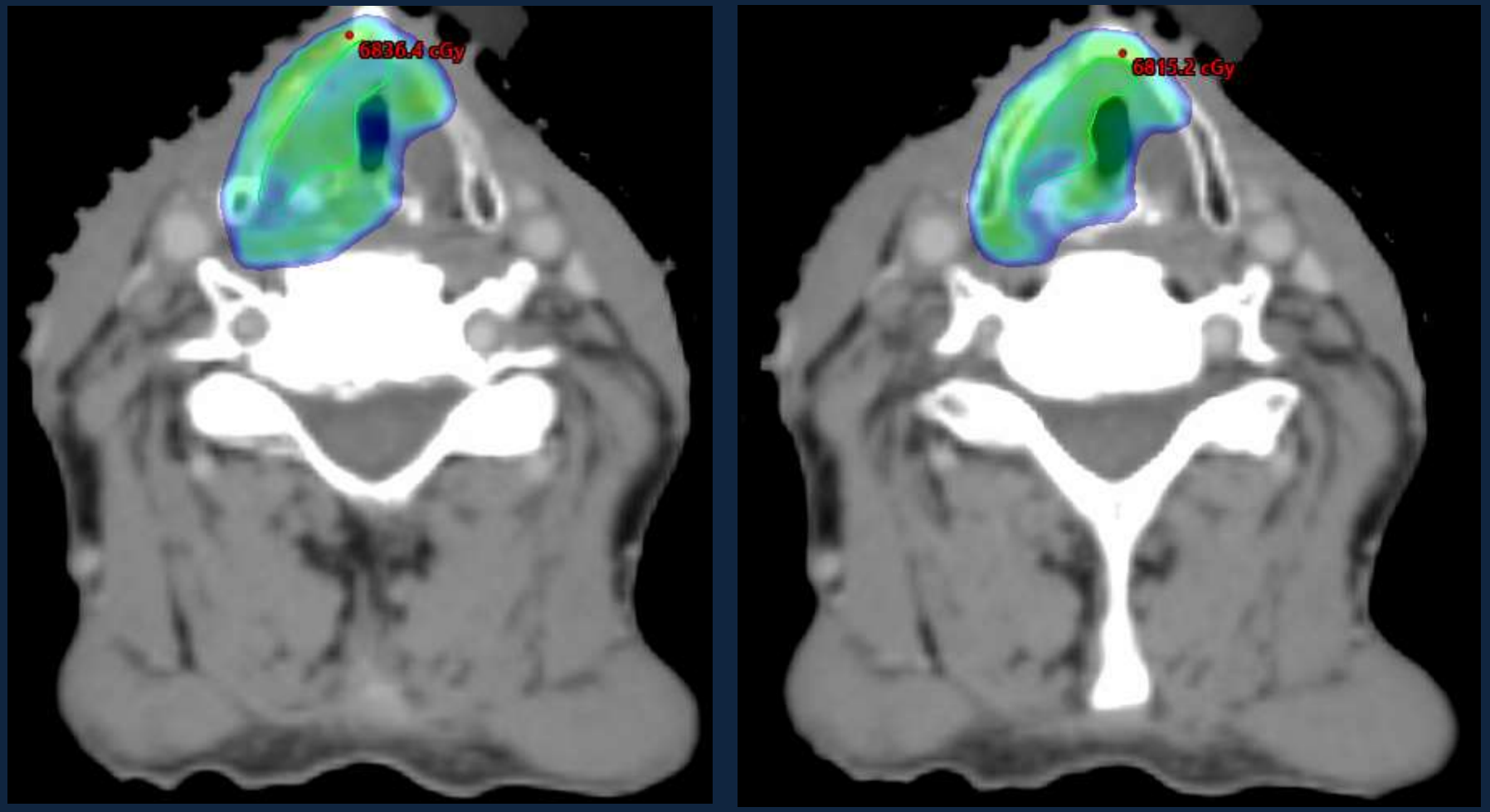


V. Grégoire et al. / Radiotherapy and Oncology 126 (2018) 3–24

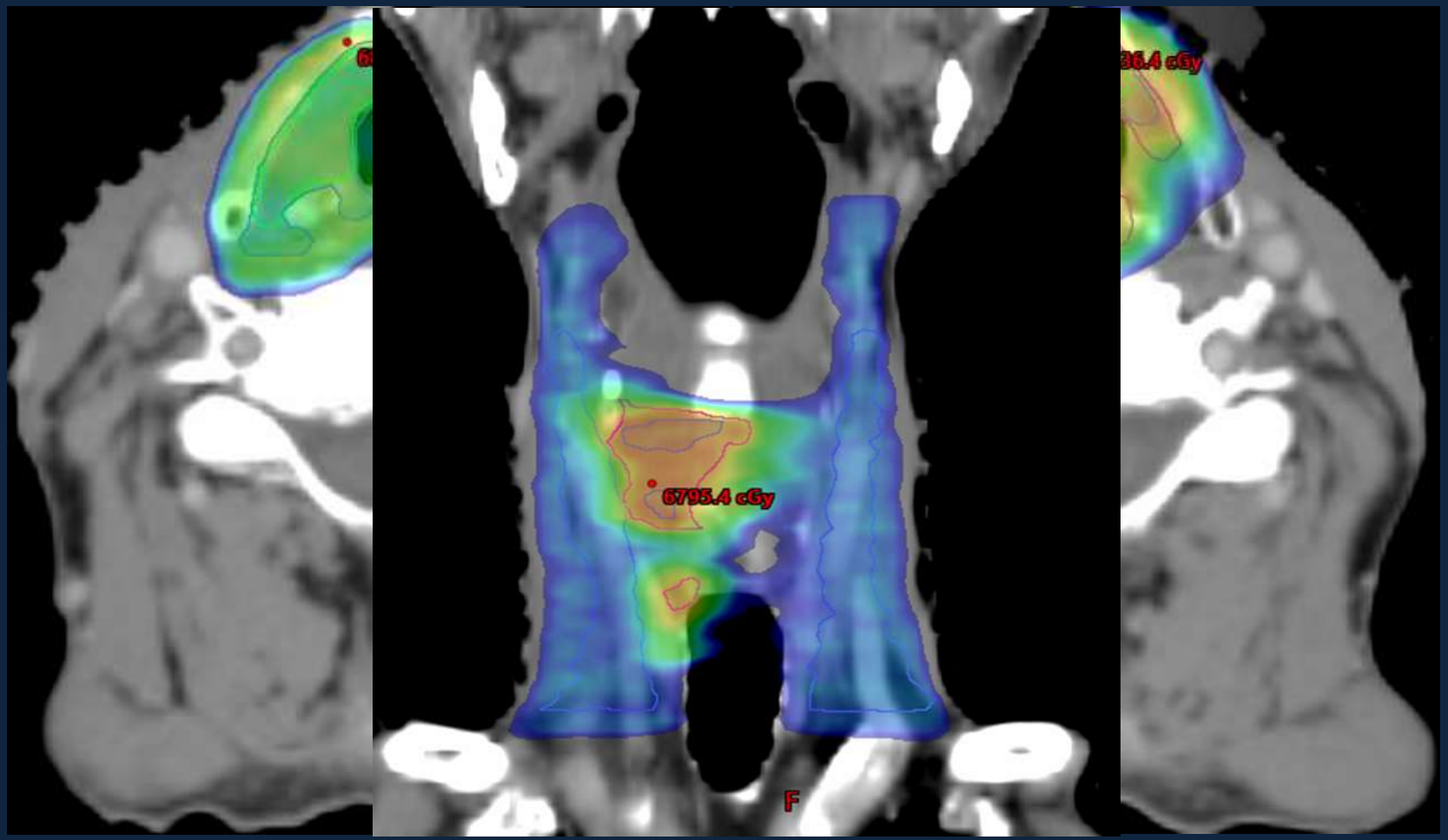
VMAT Acceptance criteria for primary and nodes

Dr Chebolu Rushikesh Goud

GTV Coverage



CTV coverage



Chemotherapy CDDP weekly or 3 weekly?

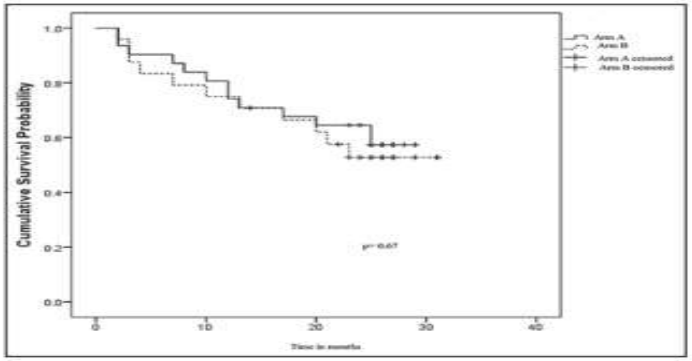
Dr Chintam Datta Sindhu

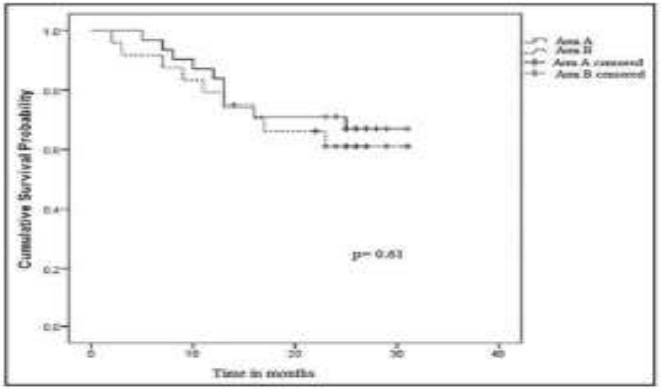
ORIGINAL ARTICLE Head and Neck Cancer

Phase IIb trial comparing two concurrent cisplatin schedules in locally advanced head and neck cancer

Lekha Madhavan Nair, R. Rejnish Kumar, Kainickal Cessal Thomachan, Malu Rafi, Preethi Sara George[1], K. M. Jagathnath Krishna[1], Kunnambath Ramadas

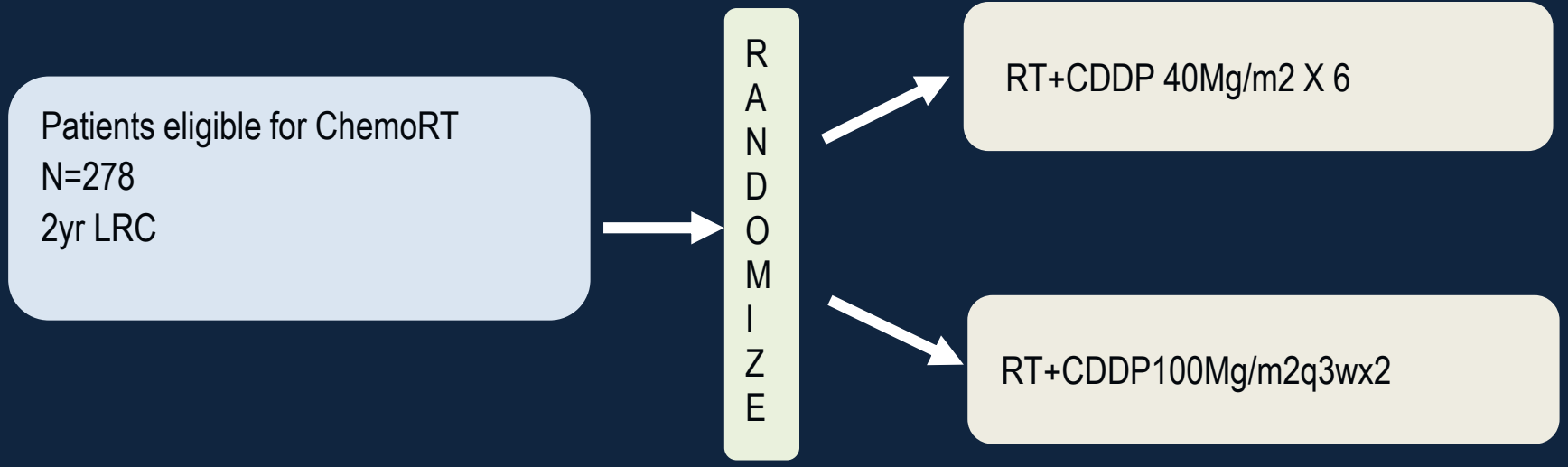
Toxicity	Arm A (*n*=31)	Arm B (*n*=24)	*P*
Mucositis			
Any grade	30 (96.7)	23 (95.83)	0.900
Grade 3/4	16 (51.6)	13 (54.1)	
Dysphagia			
Any grade	29 (93.5)	23 (95.83)	0.153
Grade 3/4	8 (25.8)	15 (62.5)	
Dermatitis			
Any grade (%)	31 (100)	24 (100)	0.486
Grade 3/4	1 (3.2)	3 (12.5)	
Anemia			
Any grade	7 (22.5)	2 (8.3)	0.300
Grade 3/4	0	1 (4.1)	
Neutropenia			
Any grade	14 (45.16)	11 (45.83)	0.583
Grade 3/4	1 (3.2)	2 (8.3)	
Thrombocytopenia			
Grade 1	1 (3.2)	1 (4.1)	0.999
Grade 2	0	1 (4.1)	
Renal toxicity			
Grade 1	2 (6.45)	4 (16.6)	0.428
Grade 2	1 (3.2)	0	





South Asian J Cancer 2017;6:64-8.

An open-label, noninferiority phase III RCTof weekly versus three weekly cisplatin and radical radiotherapy in locally advanced head and neck squamous cell carcinoma (ConCERT trial)



2 year LRC rates were 52.6% in T and 47.4% in C(log-rank p=0.426; HR 0.86 [95%CI: 0.60-1.23]

ASCO 2022, Abstract No 6004

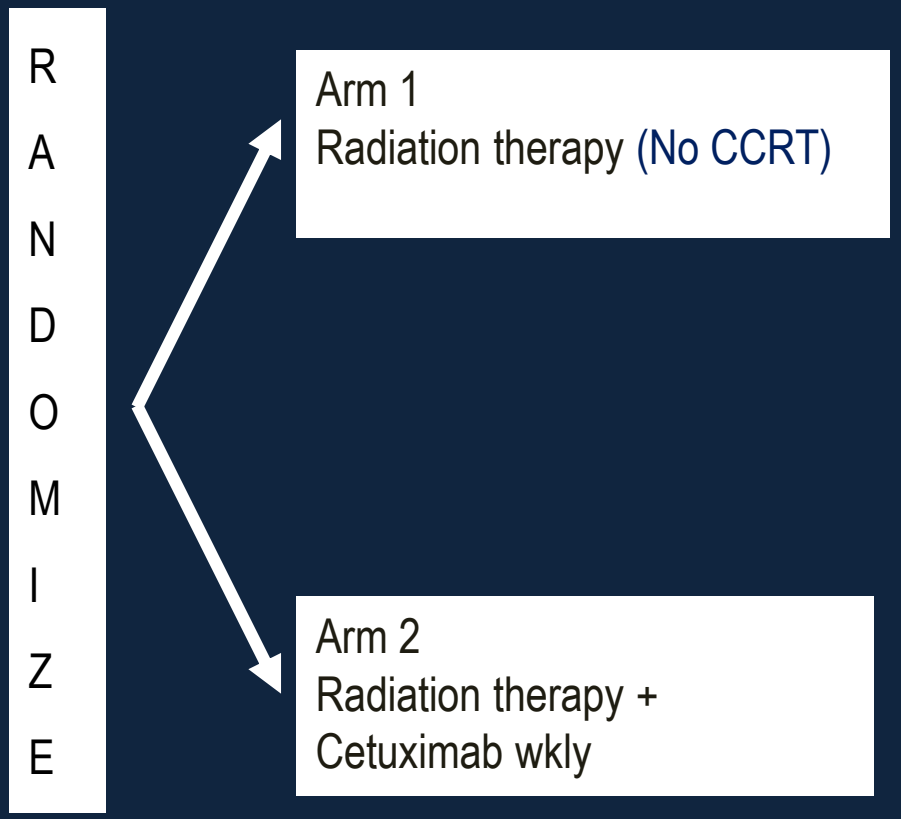
Cisplatin ineligible patients

Dr.Aditya Ambesh

Phase III Study Design

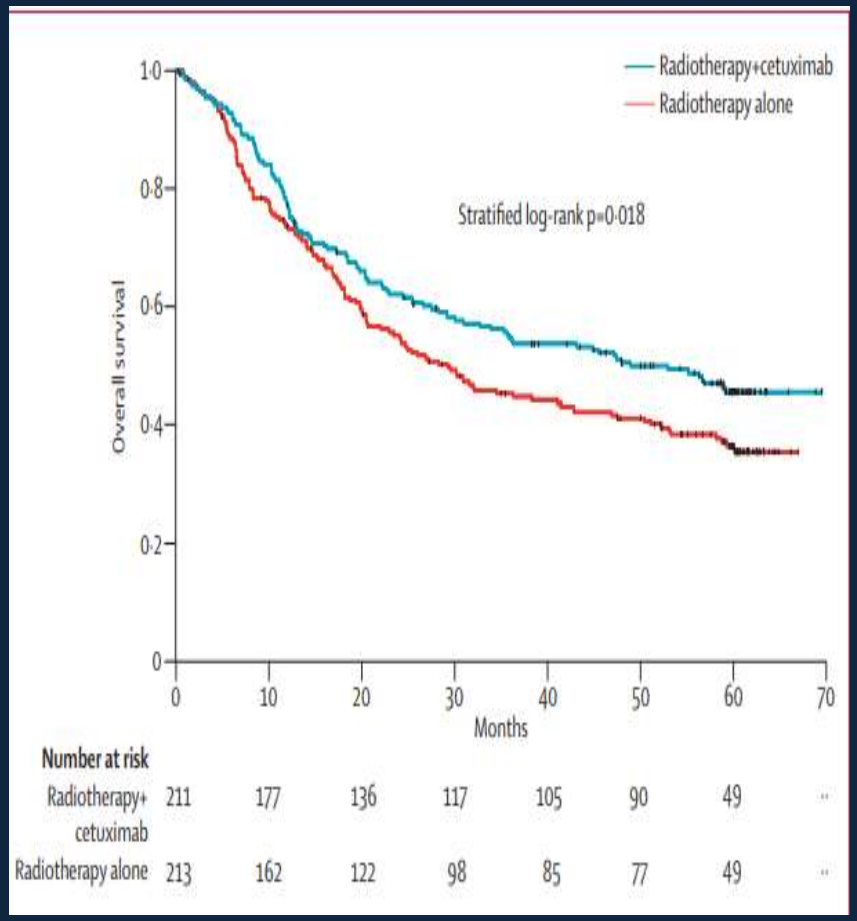
Stratified by

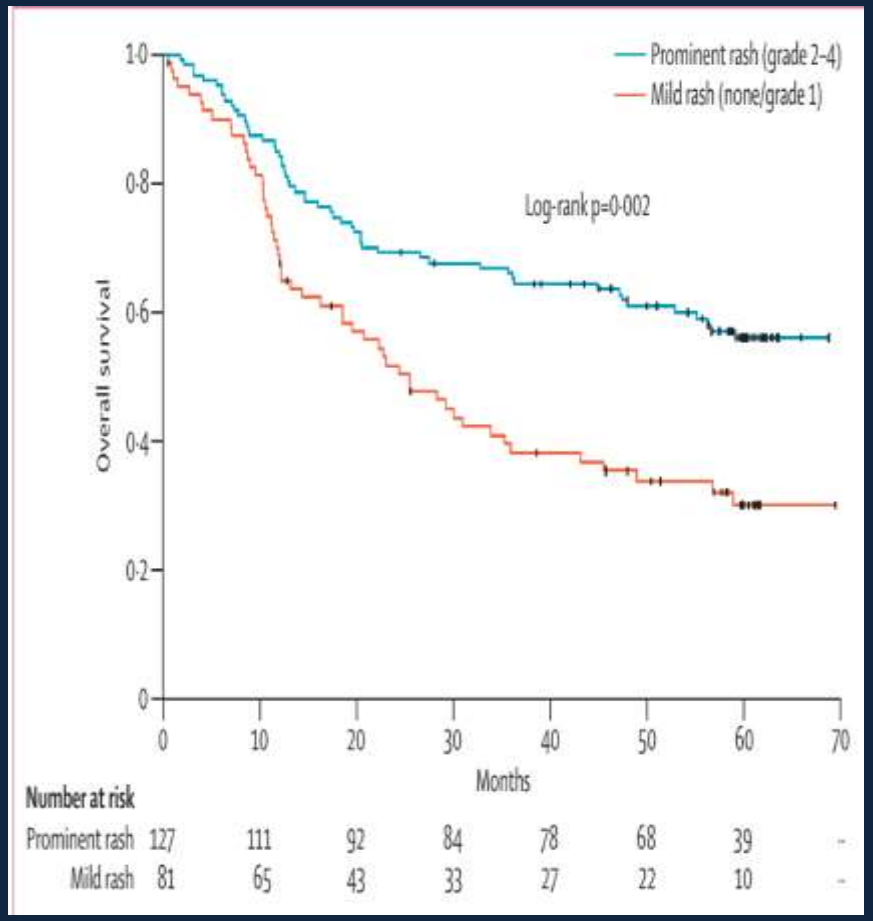
- Karnofsky score: 90-100 vs 60-80
- Regional nodes: negative vs positive
- Tumor stage: AJCC T1-3 vs T4
- RT fractionation: concomitant boost vs once daily vs twice daily



N Engl J Med 2006;354:567-78.

5yr update





Lancet Oncol 2010; 11: 21–28

CANCER STUDIES AND MOLECULAR MEDICINE

Openventio PUBLISHERS

ISSN 2377-1518 Open Journal http://dx.doi.org/10.17140/CSMMOJ-3-114

Research

*Corresponding author
Cessal Thommachan Kainickal, MD
Associate Professor
Division of Radiation Oncology
Regional Cancer Centre
Trivandrum, Kerala, India
Tel. 91-9446800850
E-mail: drcessalthomas@gmail.com

Volume 3 : Issue 1
Article Ref. #: 1000CSMMOJ3114

Current Status of Anti Epidermal Growth Factor Receptor Therapy in the Curative Treatment of Head and Neck Squamous Cell Carcinoma

Cessal Thommachan Kainickal, MD*; Aparna M. P., MD; Rejnish Kumar Ravi Kumar, MD; Malu Rafi, DNB; Kunnambath Ramadas, MD, PhD

Department of Radiation Oncology, Regional Cancer Centre, Trivandrum, Kerala, India

PubMed®

Search

Advanced User Guide

Save Email Send to Display options

> Med Int (Lond). 2024 May 29;4(4):41. doi: 10.3892/mi.2024.165. eCollection 2024 Jul-Aug.

Anti-epidermal growth factor receptor monoclonal antibody therapy in locally advanced head and neck cancer: A systematic review of phase III clinical trials

Lekha Madhavan Nair [1], Rejnish Ravikumar [1], Malu Rafi [1], Jissy Vijo Poulose [2], Nijo Jose [1], Krishnapriya Pisharody [1], Kainickal Cessal Thommachan [1]

Affiliations + expand

PMID: 38873325 PMCID: PMC11170331 DOI: 10.3892/mi.2024.165

FULL TEXT LINKS

FREE Full text PMC

ACTIONS

Cite

Collections

Check for updates

original reports

Results of Phase III Randomized Trial for Use of Docetaxel as a Radiosensitizer in Patients With Head and Neck Cancer, Unsuitable for Cisplatin-Based Chemoradiation

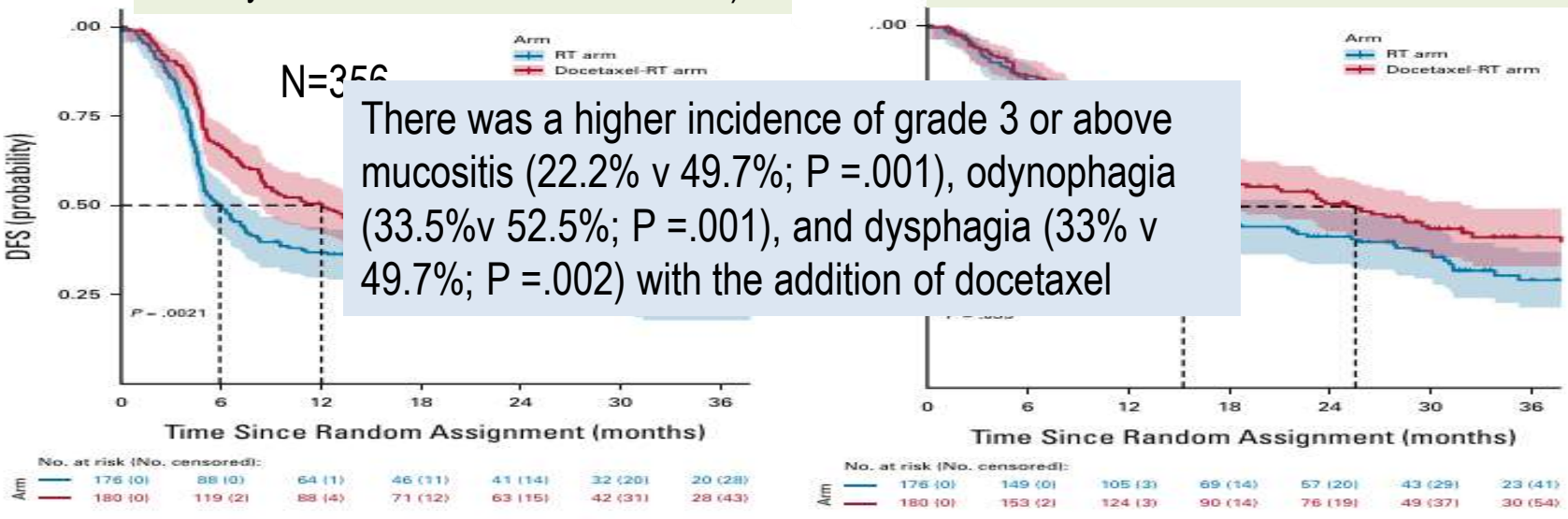
Vijay Maruti Patil, MBBS, MD, DM[1]; Vanita Noronha, MBBS, MD, DM[1]; Nandini Menon, MBBS, MD, DNB[1]; Ajay Singh, MBBS, MD, DM[1]; Sarbani Ghosh-Laskar, MBBS, MD[2]; Ashwini Budrukkar, MBBS, MD[2]; Atanu Bhattacharjee, PhD[3]; Monali Swain, MBBS, MD[2]; Vijayalakshmi Mathrudev, BHMS, MBA[1]; Kavita Nawale, PGDCR[1]; Arun Balaji, MASLP[4]; Zoya Peelay, MSc[1]; Mitali Alone, MSc[1]; Shruti Pathak, MSc[1]; Abhishek Mahajan, MBBS, MD[5]; Suman Kumar, MBBS, DNB[5]; Nilendu Purandare, MBBS, DNB[6]; Archi Agarwal, MBBS, DNB[6]; Ameya Puranik, MBBS, DNB[6]; Shantanu Pendse, MBBS, MD, DM[1]; Monica Reddy Yallala, MBBS, MD[1]; Harsh Sahu, MBBS, MD[1]; Venkatesh Kapu, MBBS, MD[1]; Sayak Dey, MBBS, MD[1]; Jatin Choudhary, MBBS, MD[1]; Madala Ravi Krishna, MBBS, MD[1]; Alok Shetty, MBBS, MD[1]; Naveen Karuvandan, MBBS, MD[1]; Rahul Ravind, MBBS, MD, DM[1]; Rahul Rai, MBBS, MD[1]; Kunal Jobanputra, MBBS, MD[1]; Pankaj Chaturvedi, MBBS, MS[7]; Prathamesh S. Pai, MBBS, MS[7]; Devendra Chaukar, MBBS, MS[7]; Sudhir Nair, MBBS, MS[7]; Shivakumar Thiagarajan, MBBS, MS[7]; and Kumar Prabhash, MBBS, MD, DM[1]

The 2-year DFS 30.3% Vs 42% P-0.002)

15.3 months Vs 25.5 months P- =.0035

N=356

There was a higher incidence of grade 3 or above mucositis (22.2% v 49.7%; P =.001), odynophagia (33.5%v 52.5%; P =.001), and dysphagia (33% v 49.7%; P =.002) with the addition of docetaxel



DOI https://doi.org/10.1200/JCO.22.0098

Role of Immunotherapy In LAHNSCC

Dr Chintam Datta Sindhu

World Journal of Clinical Oncology

Submit a Manuscript: https://www.f6publishing.com

World J Clin Oncol 2022 May 24; 13(5): 388-411

DOI: 10.5306/wjco.v13.i5.388

ISSN 2218-4333 (online)

SYSTEMATIC REVIEWS

Immune checkpoint inhibitors in head and neck squamous cell carcinoma: A systematic review of phase-3 clinical trials

Jissy Vijo Poulose, Cessal Thommachan Kainickal

Specialty type: Oncology

Provenance and peer review: Unsolicited article; Externally peer reviewed.

Peer-review model: Single blind

Peer-review report's scientific quality classification

Jissy Vijo Poulose, National Fellowship in Palliative Medicine (Training Program), Institute of Palliative Medicine, Calicut 673008, Kerala, India

Cessal Thommachan Kainickal, Department of Radiation Oncology, Regional Cancer Centre, Thiruvananthapuram 695011, Kerala, India

Corresponding author: Cessal Thommachan Kainickal, MBBS, MD, Additional Professor, Department of Radiation Oncology, Regional Cancer Centre, Medical College Campus, Thiruvananthapuram 695011, Kerala, India. drcessalthomas@gmail.com

72 Yr old PS-2 Ca Larynx T3N0

Dr Chintam Datta Sindhu

72 yr PS-2 T3N0 disease

Radiotherapy and Oncology 156 (2021) 281–293

Contents lists available at ScienceDirect

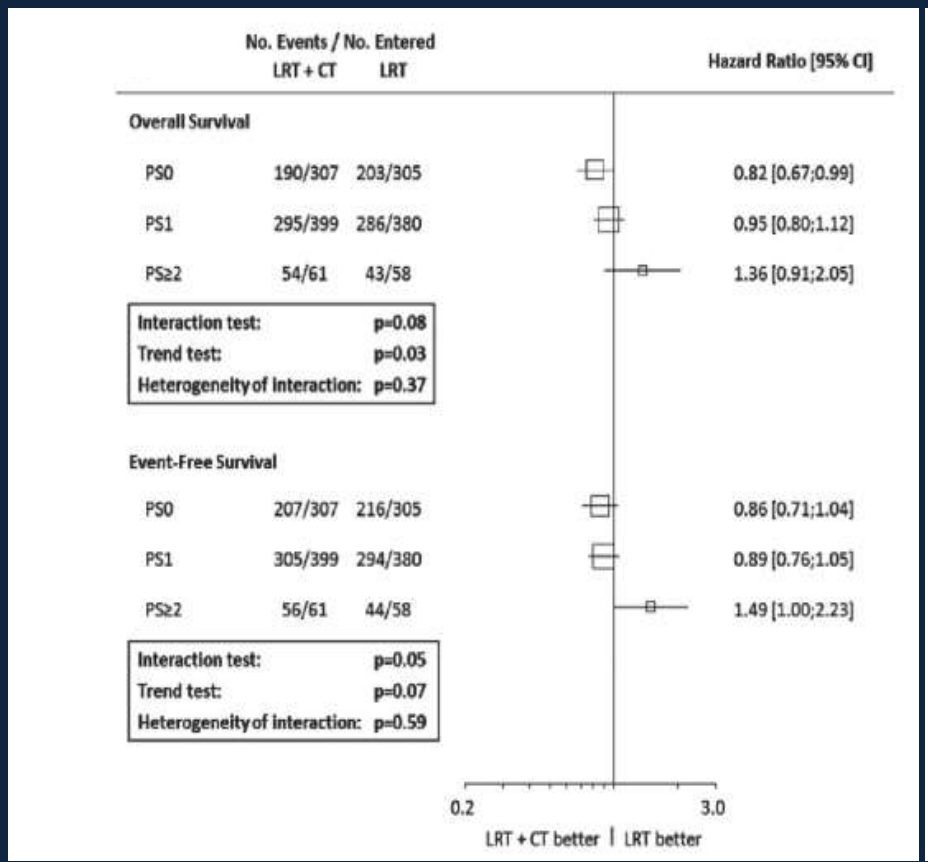
Radiotherapy and Oncology

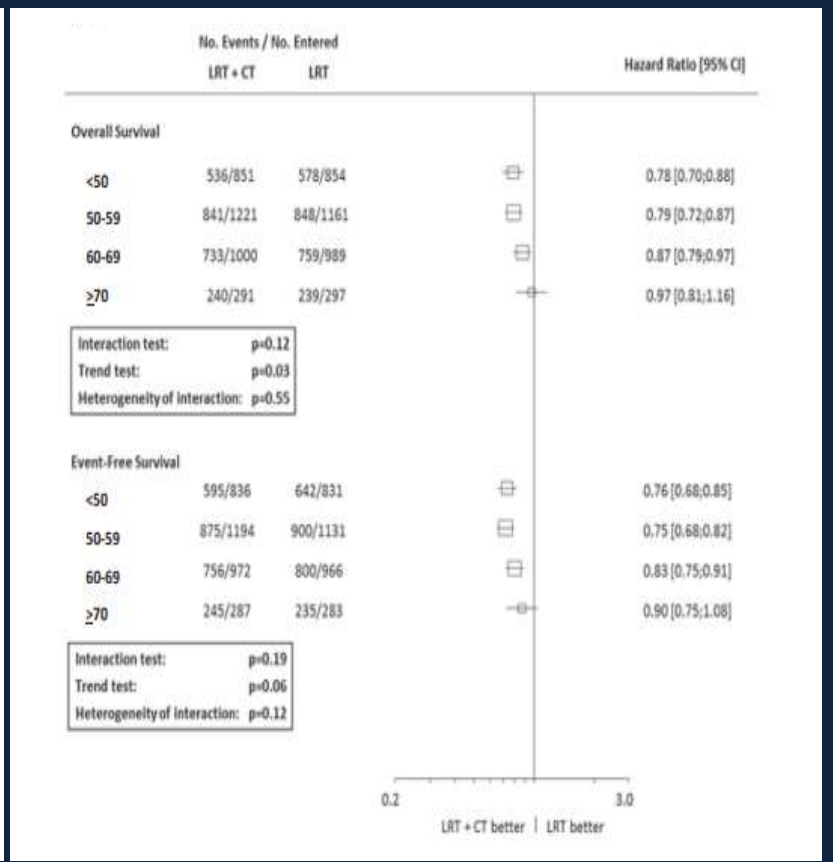
journal homepage: www.thegreenjournal.com

Original Article

Meta-analysis of chemotherapy in head and neck cancer (MACH-NC): An update on 107 randomized trials and 19,805 patients, on behalf of MACH-NC Group

Benjamin Lacas [a,b], Alexandra Carmel [a], Cécile Landais [a], Stuart J. Wong [c], Lisa Licitra [d], Jeffrey S. Tobias [e], Barbara Burtness [f], Maria Grazia Ghi [g], Ezra E.W. Cohen [h], Cai Grau [i], Gregory Wolf [j], Ricardo Hitt [k], Renzo Corvò [l], Volker Budach [m], Shaleen Kumar [n], Sarbani Ghosh Laskar [o], Jean-Jacques Mazeron [p], Lai-Ping Zhong [q], Werner Dobrowsky [r], Pirus Ghadjar [s], Carlo Fallai [t], Branko Zakotnik [u], Atul Sharma [v], René-Jean Bensadoun [w], Maria Grazia Ruo Redda [x], Séverine Racadot [y], George Fountzilas [z], David Brizel [aa], Paolo Rovea [ab], Athanassios Argiris [ac], Zoltán Takácsi-Nagy [ad], Ju-Whei Lee [ae], Catherine Fortpied [af], Jonathan Harris [ag], Jean Bourhis [b,ah], Anne Aupérin [a,b], Pierre Blanchard [a,b,ai,*], Jean-Pierre Pignon [a,b], on behalf of the MACH-NC Collaborative Group

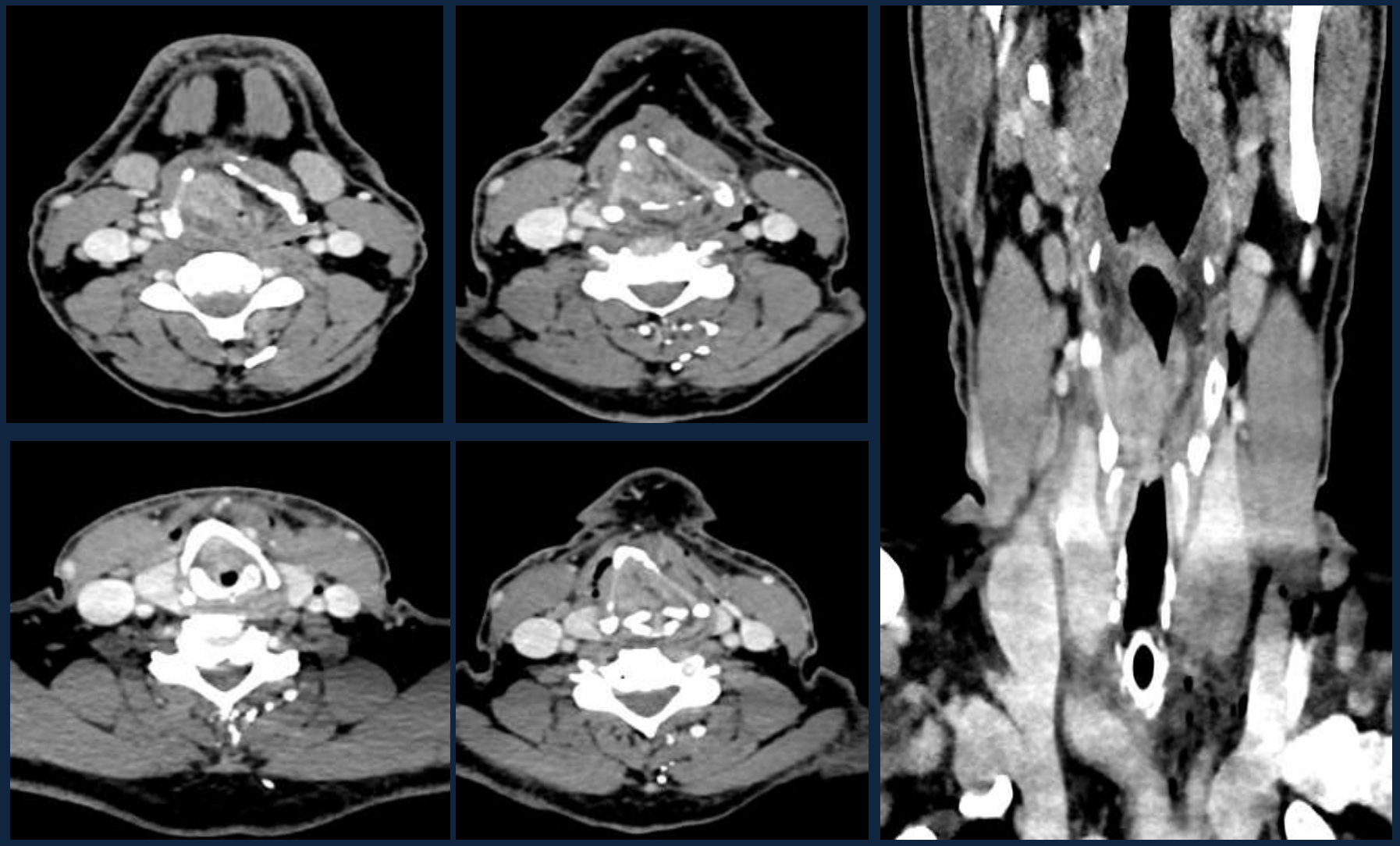




ChemoRT in patients underwent Tracheostomy

Dr Drashti Patel

CCRT or Surgery followed by Adjuvant?



PubMed®

Search

Advanced

User Guide

Save | Email | Send to | Display options

> Mol Clin Oncol. 2022 Nov 15;18(1):1. doi: 10.3892/mco.2022.2597. eCollection 2023 Jan.

Outcomes of organ preservation treatment in advanced laryngeal carcinoma: A retrospective analysis from a single institution

Afsar Fasaludeen [1], Rejnish Ravi Kumar [1], Malu Rafi [1], Farida Nazeer [1], Aparna Mullangath Prakasan [1], Naveen Kumar [1], Preethi George [2], Kunnambath Ramadas [1], Kainickal Cessal Thommachan [1]

Affiliations + expand

PMID: 36545209 PMCID: PMC9756020 DOI: 10.3892/mco.2022.2597

Free PMC article

FULL TEXT LINKS

FREE Full text PMC

ACTIONS

Cite

Collections

SHARE

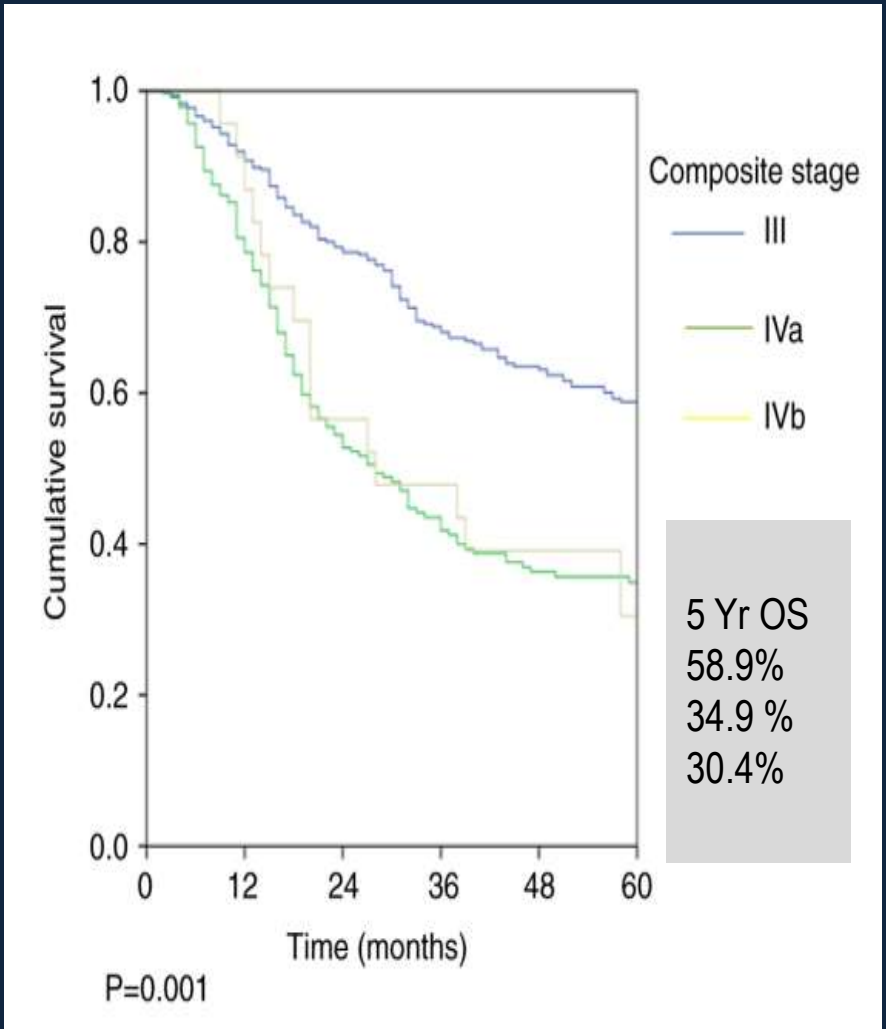
N=630 patients

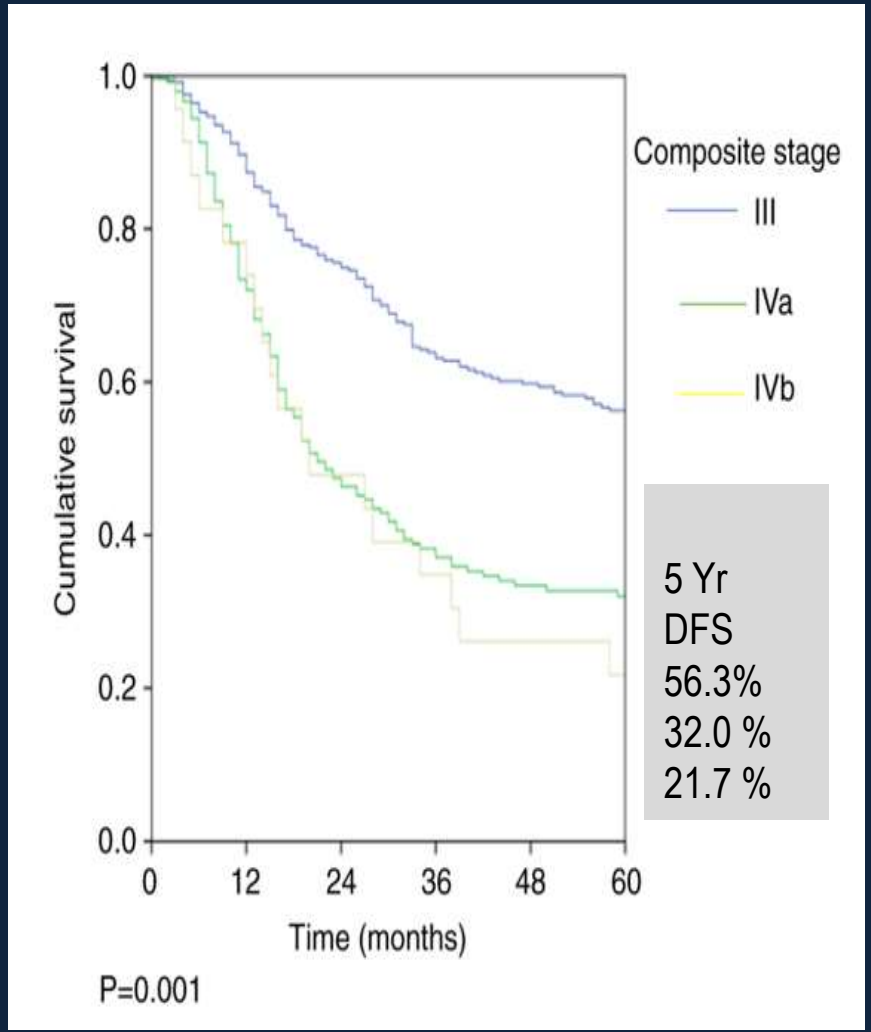
Composite stage		
Stage III	367	58.1
Stage IVa	240	38.3
Stage IVb	23	3.6

CCRT	295	46.8
IC followed by CCRT	139	22.1
IC followed by RT	17	2.6
RT alone (no chemotherapy)	177	28.1

DOI: 10.3892/mco.2022.2597

Median follow up 59 Months

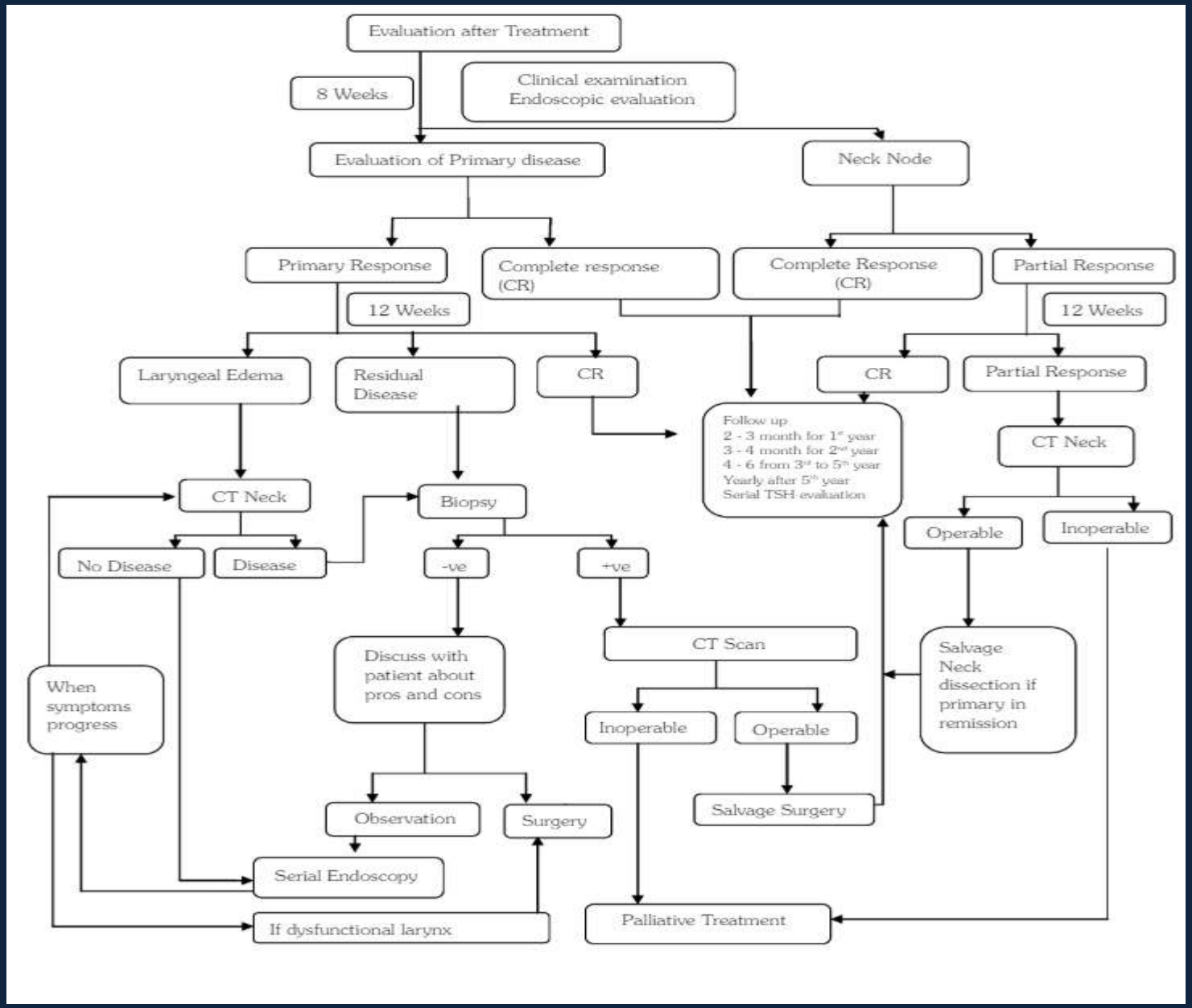




DOI: 10.3892/mco.2022.2597

How you will follow up after ChemoRT/RT

Dr Drashti Patel



https://main.icmr.nic.in/sites/default/files/reports/Larynx%20and%20Hypopharynx%20Cancers.pdf

Survival of patients received ChemoRT

Dr Aditya Ambesh

RTOG 91-11 Update

The 5- and 10-Year Estimates of Efficacy End Points

End Point	RT + Induction Chemotherapy		RT + Concomitant Chemotherapy		RT Alone	
	Estimate (%)	95% CI (%)	Estimate (%)	95% CI (%)	Estimate (%)	95% CI (%)
Laryngectomy-free survival						
5 years	44.1	36.6 to 51.6	47.0	39.5 to 54.5	34.0	26.8 to 41.3
10 years	28.9	21.9 to 36.0	23.5	16.8 to 30.3	17.2	11.2 to 23.3
Larynx preservation						
5 years	70.8			78.1 to 89.2	65.8	58.7 to 73.0
10 years	67.5			75.9 to 87.6	63.8	56.5 to 71.1
Local control						
5 years	58.2			64.3 to 77.9	53.6	46.1 to 61.1
10 years	53.7			62.3 to 76.1	50.1	42.5 to 57.7
Locoregional control						
5 years	54.8			60.7 to 74.7	51.2	43.7 to 58.8
10 years	48.9			58.1 to 72.4	47.2	39.6 to 54.8
Distant control						
5 years	85.3	79.9 to 90.6	86.4	81.2 to 91.6	78.0	71.7 to 84.3
10 years	83.4	77.7 to 89.0	83.9	78.2 to 89.5	76.0	69.4 to 82.5
Disease-free survival						
5 years	37.7	30.4 to 45.0	38.0	30.8 to 45.3	28.0	21.1 to 34.8
10 years	20.4	14.0 to 26.7	21.6	15.2 to 28.0	14.8	9.2 to 20.3
Overall survival						
5 years	58.1	50.6 to 65.5	55.1	47.6 to 62.6	53.8	46.1 to 61.4
10 years	38.8	31.2 to 46.3	27.5	20.4 to 34.5	31.5	24.1 to 39.0

10 yr OS

- CCRT -27.5%
- IC followed by RT= 39.8%
- RT alone – 31.5%

DOI: 10.1200/JCO.2012.43.6097

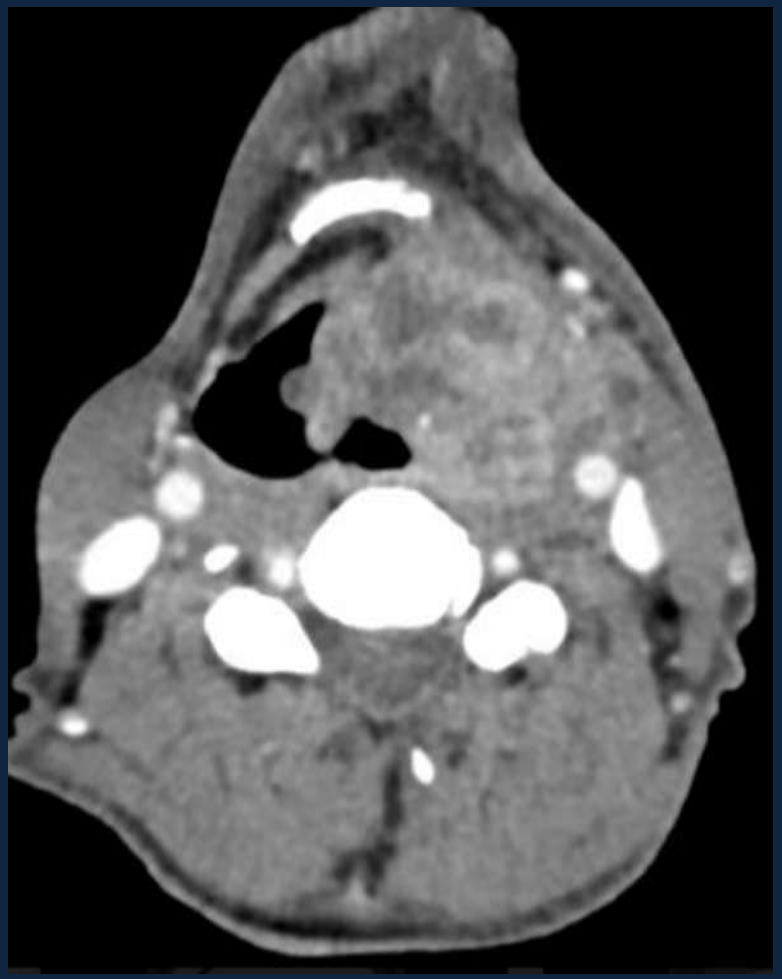
Management of CT4a Ca Larynx

Dr Aditi Agrawal

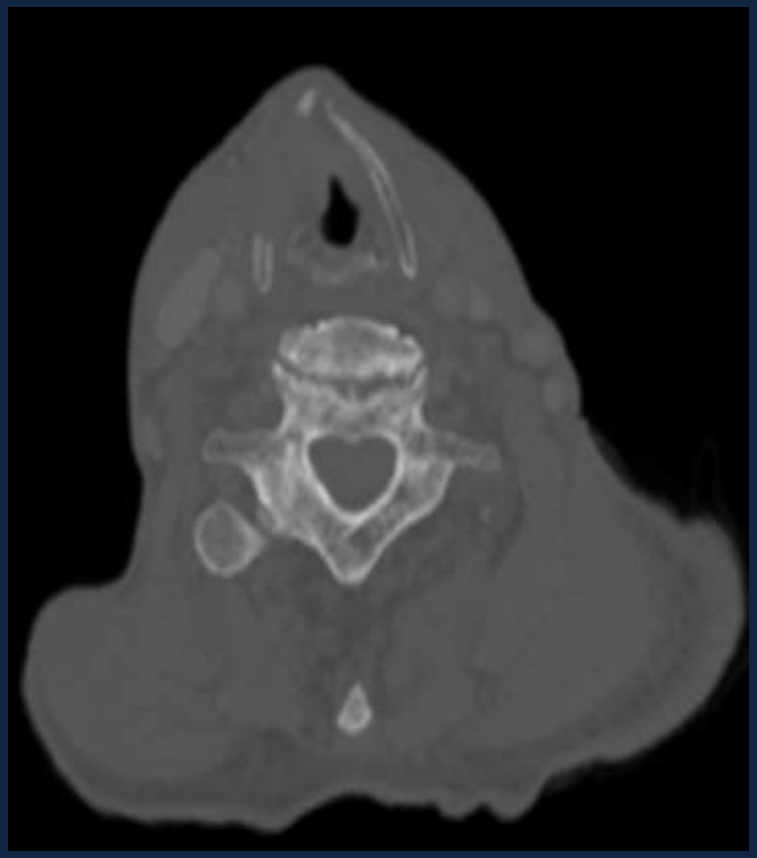
CT4a - Stage IVa

- Extra laryngeal extension with cartilage +/-
- Trachea
- Thyroid
- Oesophagus
- Extrinsic muscles of the tongue

T4a with cartilage intact



67 PS-1 Stage and Management?



Planned treatment – Surgery followed by adjuvant treatment

VA Study

- **T4 with tumor extending through the thyroid cartilage into neck soft tissue**

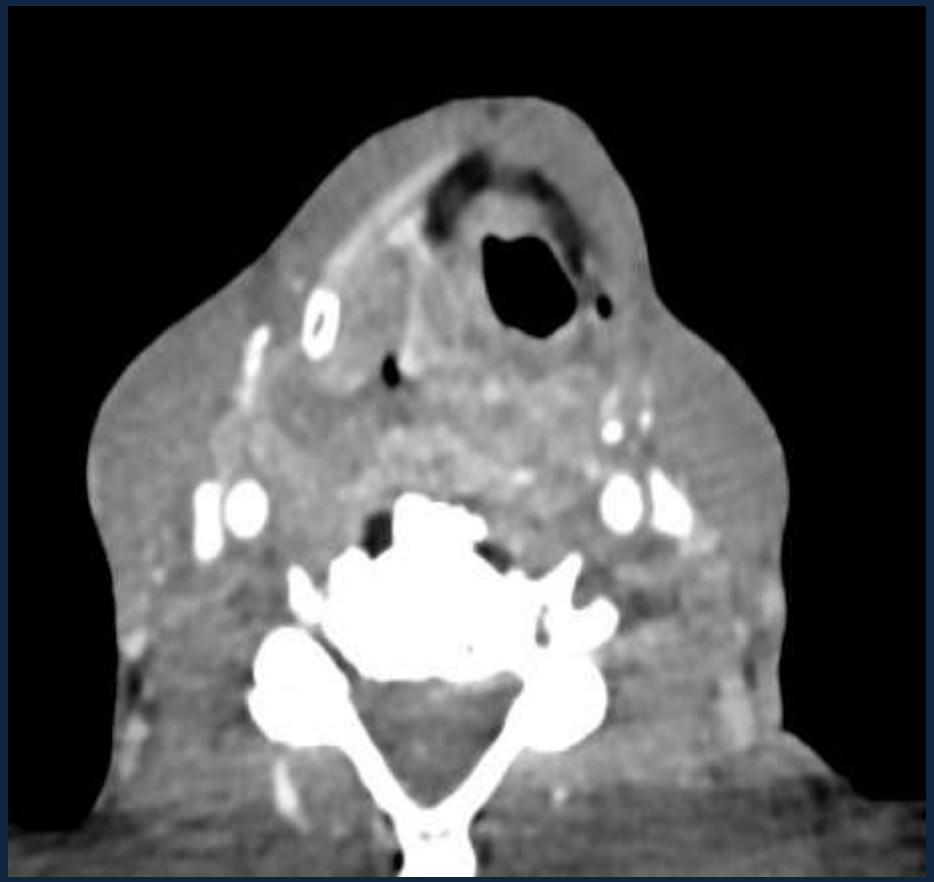
Salvage Laryngectomy at the VA Trial

< T4	28%	
T4	56%	p = 0.001

Management of T4b/N3 disease

Dr Chebolu Rushikesh Goud

T4b -Stage IVb



T4b/N3- stage IVB- Radical approach

- Only in selected cases
- Good PS
- Young patient
- Low volume disease
- Absence of heavy nodes
- Good social support
- Highly motivated

Radical approach -T4b

- With cartilage intact- CCRT

- With cartilage involvement –IC and reassessment

Take home messages

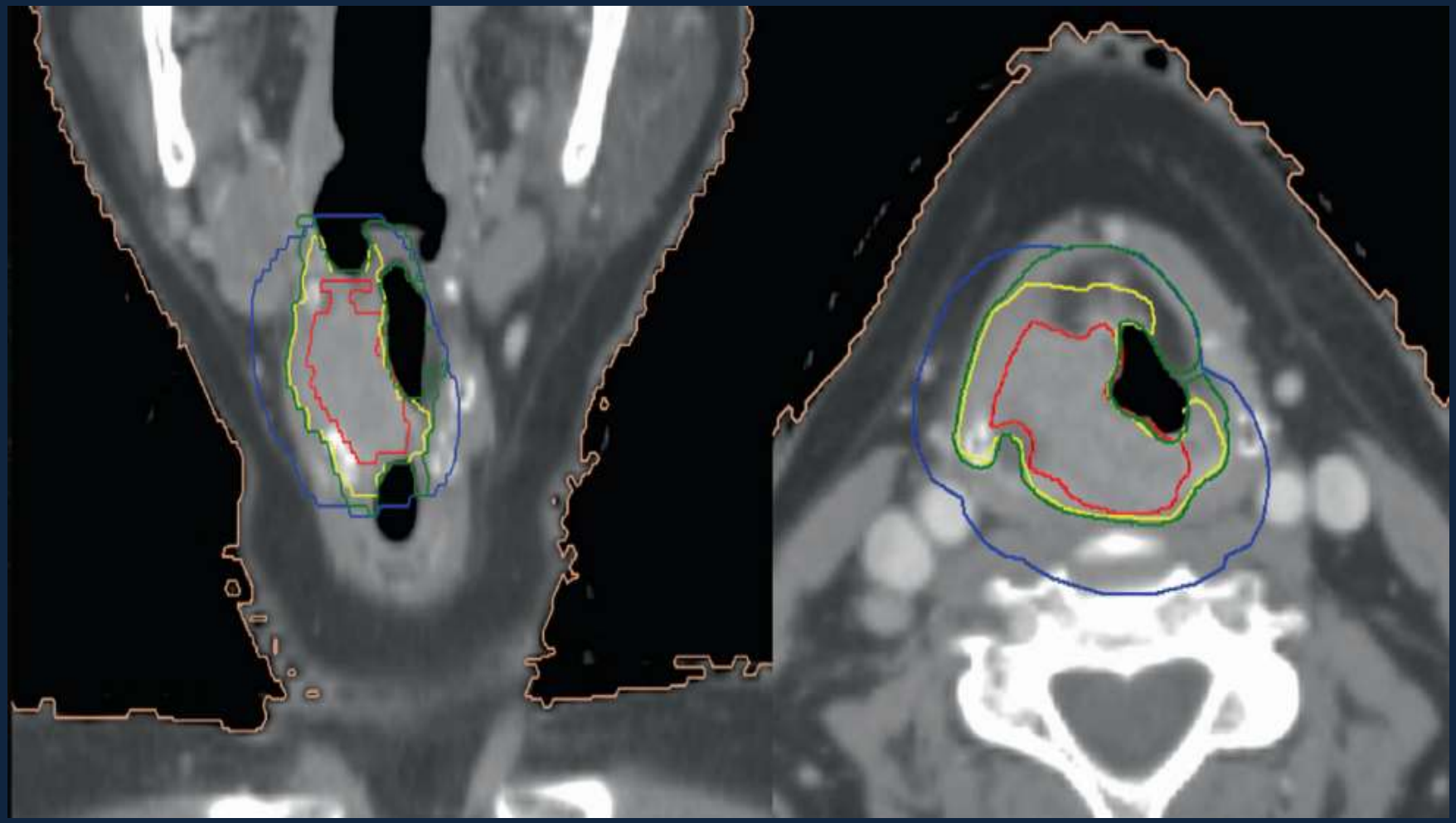
- T1-T2N1-N2- CCRT
- T3N0-N2-CCRT- If no dysfunction
- No proven data for Concurrent CDDP above 70 yrs.
- T4a with out cartilage destruction and no dysfunction – CCRT
- Induction chemotherapy is not routinely recommended
- T4a with cartilage destruction- S+ Adjuvant treatment
- T4b- selected patient- Radical Rx
- N3- selected patient- Radical Rx
- Elderly patients and poor GC ,Palliative treatment

	HEAD AND NECK ONCOLOGY SESSION		
	Chairpersons: **Dr Belliappa M.S**, Consultant Radiation Oncologist, Aster CMI, Bengaluru **Dr Sudhir Singh**, Professor, Department of Radiation Oncology, King George Medical University, Lucknow		
10:30 AM to 10:50 AM	Emerging insights into the Genetic map of Head and Neck cancers	Speaker	**Dr Sanjoy Chatterjee** Consultant, Tata Medical Centre, Kolkata
10:50 AM to 11:10 AM	Contouring in Post op head and neck setting	Speaker	**Dr Vincent Gregoire** Head, Department of Radiation Oncology, Léon Bérard Cancer Centre, Lyon, France
11:10 AM to 11:30 AM	Immunomodulation of Radiotherapy - the Present and Future	Speaker	**Dr. Cessal T Kainickal** Additional Professor, Department of Radiation Oncology, Regional Cancer Centre, Thiruvananthapuram
11:30 AM to 11:50 AM	Trying to beat biology: Treatment of Oligometastatic Disease in HNSCC	Speaker	**Dr Sarbani Ghosh Laskar** Professor, Department of Radiation Oncology, Tata Memorial Hospital, Mumbai
11:50 AM to 12:10 PM	Adaptation - Newer insights and Future directions	Speaker	**Dr Tanweer Shahid** Consultant Radiation Oncologist, Apollo Cancer Centre, Kolkata
	Chairpersons: **Dr R K Vyas**, Professor, Department of Radiation Oncology, AIIMS, Jodhpur **Dr Madhup Rastogi**, Senior Consultant, Department of Radiation Oncology Dr. Ram Manohar Lohia Institute of Medical Sciences, Lucknow **Prof Ezhilarasi Ravindran**, Head of Department of Oncology, Chalmeda Anand Rao Institute of Medical Sciences Cancer Hospital and Research Institute, Karim Nagar, Telangana		
12:10 PM to 12:30 PM	Should concurrent chemotherapy be added to adjuvant radiation therapy in the treatment of intermediate - Risk head and neck cancer?	Moderator	**Dr Sushmita Ghoshal** Professor of Radiotherapy, PGIMER, Chandigarh
		For	**Dr Swarupa Mitra** Director and Unit Head, Radiation Oncology, Fortis Cancer Institute, FMRI, Gurugram
		Against	**Dr Pooja Nandwani Patel** Director - Radiation Oncology, Sterling Hospitals, Ahmedabad
12:30 PM to 01:00 PM	The Battle against HPV - Where do we stand & Where are we going ?	Moderator	**Dr Geeta Narayan** Professor and Head, Department of Radiation Oncology, Vydehi Institute of Medical Sciences, Bengaluru
		Panelist	**Dr. Sidanna Palled** Professor, Dept. of Radiation Oncology, KMIO, Bengaluru
		Panelist	**Dr Shantling Nigudgi** Medical Head & Sr Consultant HCG Kalburgi
		Panelist	**Dr Karthik KS** Consultant Surgical Oncologist KMC Hospital, Mangalore
		Panelist	**Dr Sharadha Rai** Professor, Department of Pathology KMC Mangalore
		Panelist	**Dr Vikram Maiya M** Consultant, Apollo Hospitals, Bengaluru
		Panelist	**Dr Nishitha Shetty** Professor, Department of Medical Oncology, FMMC Mangalore
		Panelist	**Dr R Vijayabhaskar** Senior Consultant, Surgical Oncology, MMHRC Madurai

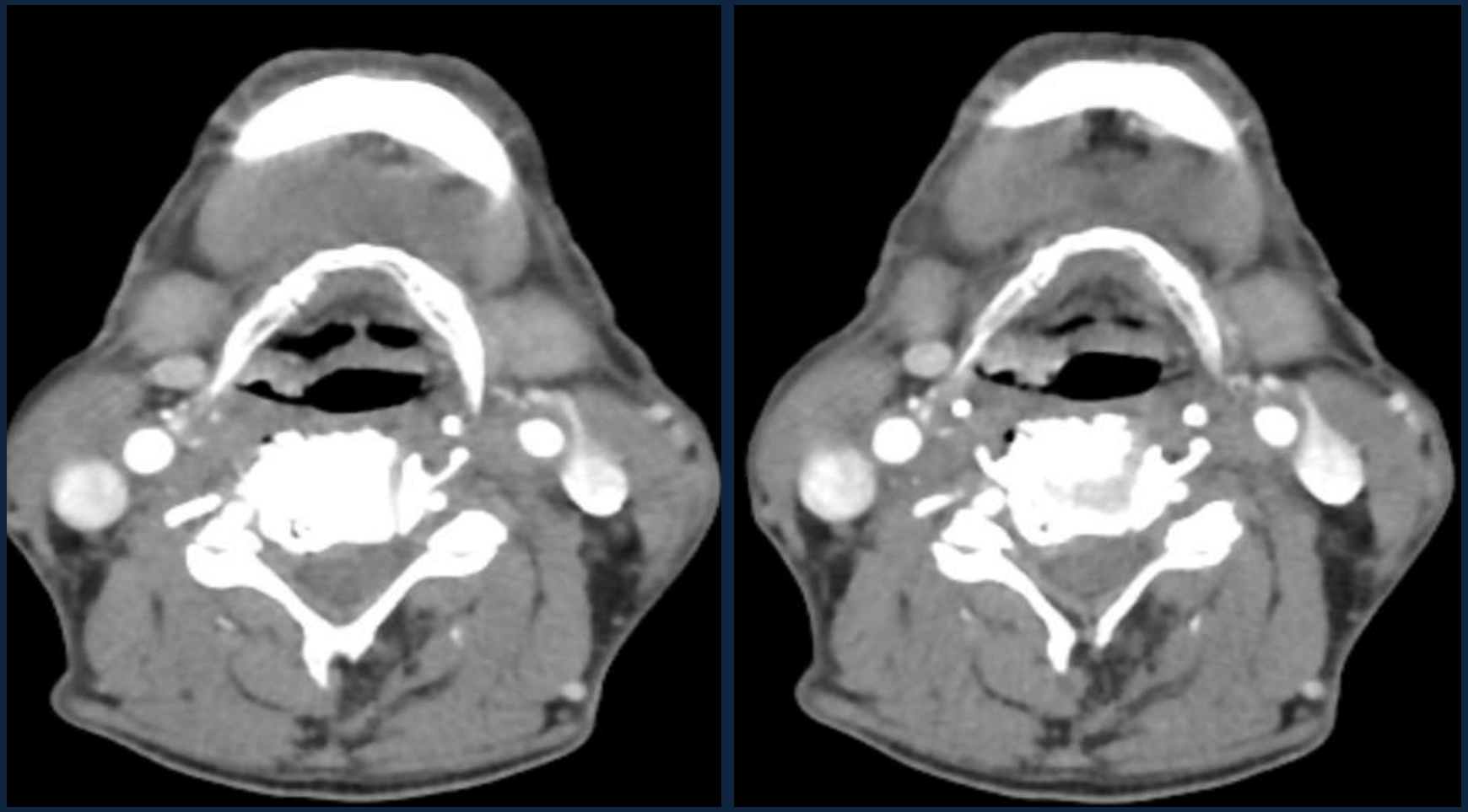
Thank you

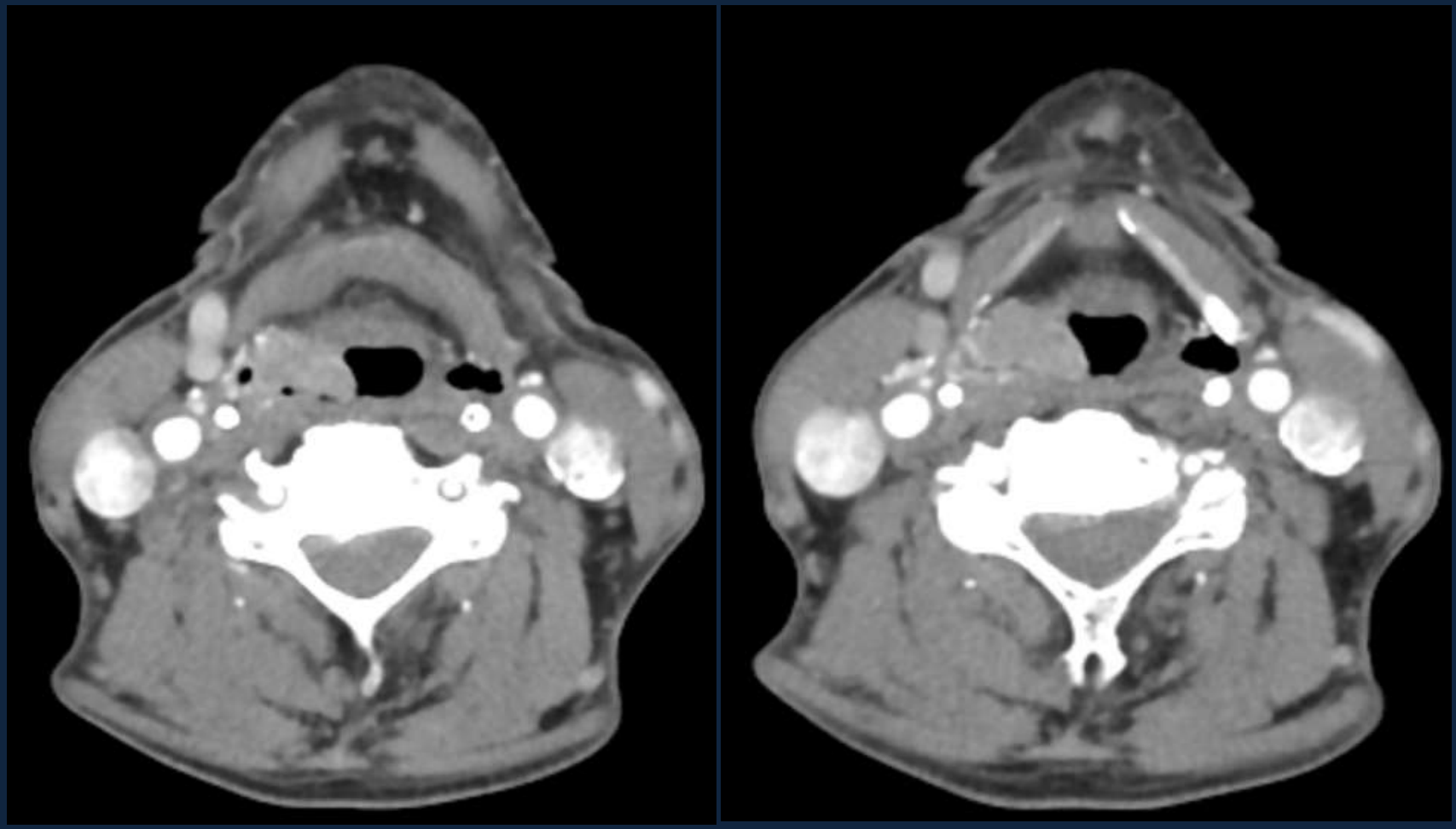
drcessalthomas@gmail.com

T3 Larynx



V. Grégoire et al. / Radiotherapy and Oncology 126 (2018) 3–24





Chemotherapy added to locoregional treatment for head and neck squamous-cell carcinoma: individual data

*J P Pignon, J Bourhis, C Domenge, L Designé, on behalf of the MACH-NC Collaborative Group**

Trial category	Hazard ratio (95% CI)	Chemo-therapy effect (p)	Heterogeneity (p)	Absolute benefit	
				At 2 years*	At 5 years*
Adjuvant	0·98 (0·85–1·19)	0·74	0·35	1%	1%
Neoadjuvant	0·95 (0·88–1·01)	0·10	0·38	2%	2%
Concomitant	0·81 (0·76–0·88)	<0·0001	<0·0001	7%	8%
Total	0·90 (0·85–0·94)	<0·0001	<0·0001	4%	4%

Lancet 2000; **355:** 949–55