5 Minute JournalClub

Key ASH Presentations
Issue 1, 2012

R-CHOP versus R-FC Followed by Rituximab versus IFN Maintenance in Elderly Patients with MCL

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CME INFORMATION

OVERVIEW OF ACTIVITY

The annual American Society of Hematology (ASH) meeting is unmatched in its importance with regard to advancements in hematologic cancer and related disorders. It is targeted by many members of the clinical research community as the optimal forum in which to unveil new clinical data. This creates an environment each year in which published results and new information lead to the emergence of many new therapeutic agents and changes in the indications for existing treatments across virtually all malignant and benign hematologic disorders. As online access to posters and plenary presentations is not currently available, a need exists for additional resources to distill the information presented at the ASH annual meeting for those clinicians unable to attend but desiring to remain up to date on the new data released there. To bridge the gap between research and patient care, this CME activity will deliver a serial review of the most important emerging data sets from the latest ASH meeting, including expert perspectives on how these new evidence-based concepts can be applied to routine clinical care. This activity will assist medical oncologists, hematologists and hematology-oncology fellows in the formulation of optimal clinical management strategies and the timely application of new research findings to best-practice patient care.

LEARNING OBJECTIVES

- Evaluate the efficacy and toxicity outcomes of maintenance rituximab versus rituximab re-treatment upon disease progression, and incorporate this information into your personal treatment algorithm for patients with low tumor burden follicular lymphoma.
- Assess the efficacy of maintenance rituximab in disease settings in non-Hodgkin lymphoma for which standard treatment is not well established, including for elderly patients with advanced follicular lymphoma.

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Key ASH Presentations
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To go directly to slides and commentary for this issue, **click here**.

Last month's annual American Society of Hematology (ASH) meeting seems like a blur, particularly because it partially overlapped the San Antonio Breast Cancer Symposium. So in addition to poring over hundreds of abstracts I recently turned to a couple of my favorite hem-onc investigators to help piece together what happened in San Diego, beginning with the always colorful Brooklyn-born Yankees and Jets fan, Memorial's Dr Craig Moskowitz.

The first topic we dove into was perhaps the most anticipated lymphoma paper of the meeting, Dr Brad Kahl's presentation of the results of ECOG's Phase III RESORT trial evaluating indefinite rituximab (R) maintenance versus short-term R induction with R re-treatment on progression in patients with low tumor burden follicular lymphoma (FL). For years listeners to our audio programs have heard Dr Kahl describe the rationale for and early safety data from this historic study, but the mood in the huge convention hall was downright somber when the disappointing and overlapping curves for time to treatment failure popped up, although at 3 years fewer patients required chemo on the indefinite R arm (5% versus 14%). Always a creative thinker, Dr Moskowitz had another take on the findings.

"Patients in the RESORT control arm got just 4 weeks of rituximab — that's a month of treatment — and their median time to progression was almost 4 years. I'm thinking that's not terrible." Like many lymphoma investigators, Dr Moskowitz has in the past been very pro "watch and wait" in indolent lymphoma, and I was curious about his current perspective. "Already since ASH, based on RESORT I've given a patient rituximab who could have been monitored. People are taking a negative view of RESORT because of the maintenance issue, but I think of it another way. Here's my 76-year-old guy who may never need chemotherapy. That could be pretty cool for him. My sense is that it's not a totally negative study." Craig further explained that his R monotherapy strategy is based on the **SAKK regimen** of a total of 8 R courses over 9 months.

I also turned to another trusted and candid investigator, Rush University lymphoma scholar Dr Stephanie Gregory, for her perspectives, and she too had a lot to say about RESORT, quickly pointing out that in spite of the data we still have not defined the optimal duration of R maintenance, including after R/chemo up front. She also referred to a number of trials evaluating this crucial question, including a German study of 2 versus 4 years of R maintenance.

Click here for the RESORT slides and **here** for another, smaller study of R maintenance in FL, and see below for other related ASH lymphoma data sets.

R maintenance in mantle-cell lymphoma (MCL)

This was an update of a practice-changing European study that was first reported last year at EHA in London. The favorable outcome with R maintenance has now led most investigators, including Dr Gregory, to routinely use R maintenance after R/chemo induction in patients with MCL who are not candidates for transplant. A major ECOG trial is evaluating R maintenance alone or with lenalidomide in this cohort.

R maintenance in chronic lymphocytic leukemia (CLL)

The results from this Phase II Spanish study have not changed Dr Gregory's approach to R maintenance in CLL (she doesn't use it), and she noted that R is believed to have less antitumor effect in CLL than, for example, in FL. She voiced more optimism about an experimental strategy we have heard a lot about in multiple myeloma, namely lenalidomide maintenance.

R/chemo followed by radioimmunotherapy (RIT) followed by R maintenance in untreated FL

Although the results of this MD Anderson report were considered promising, there were 3 cases of MDS out of 47 total patients. Dr Gregory thinks the choice of chemo preceding RIT (R-FND and specifically the fludarabine) was problematic and notes that Dr Mark Kaminski's classic up-front FL study of 76 patients treated with RIT alone reported only 1 case of MDS (in a patient who had received chemo after relapse).

Next we proceed to a prominent part of the Moskowitz ASH lymphoma highlight reel, the continued fascinating story of the antibody-drug conjugate brentuximab vedotin.

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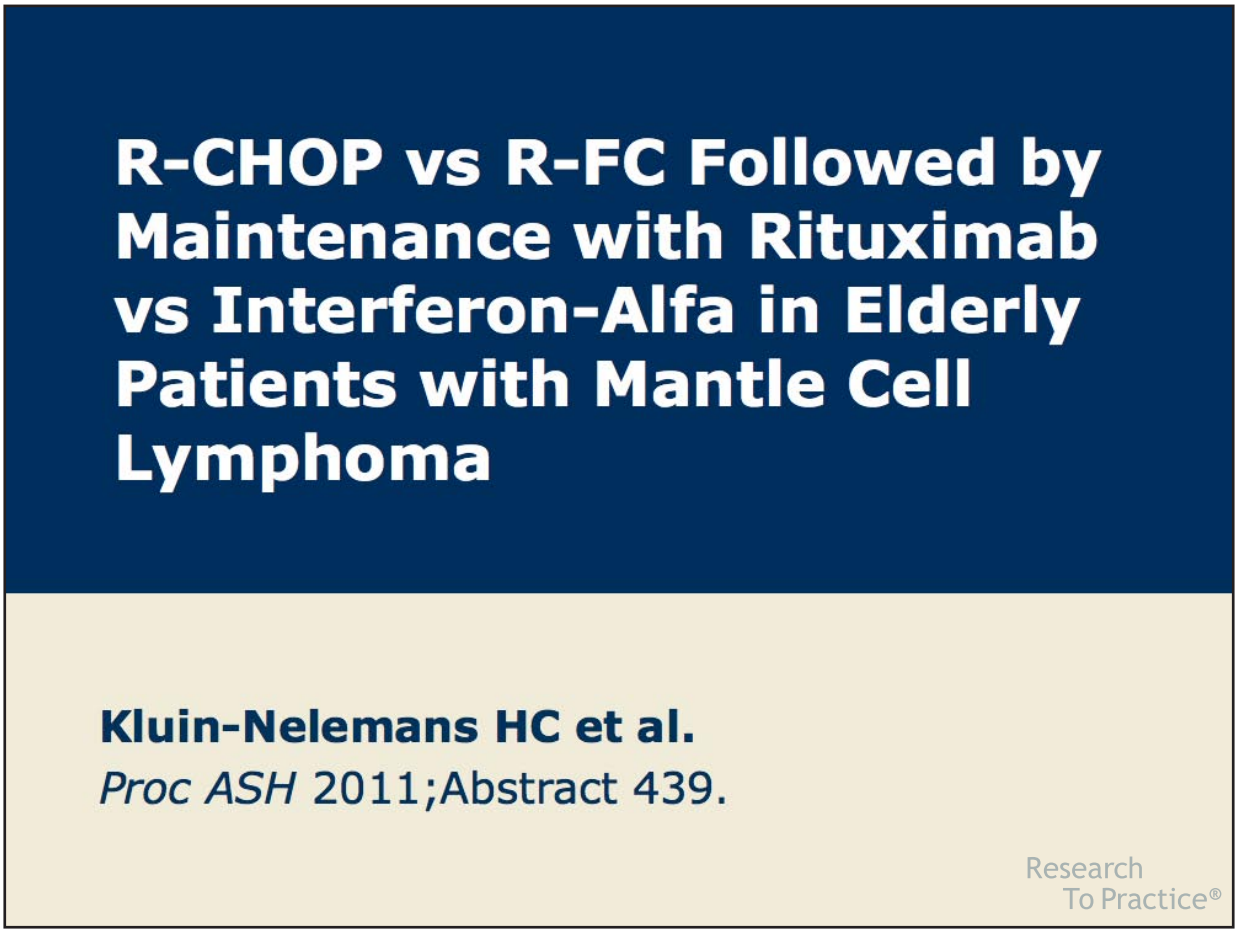
R-CHOP versus R-FC Followed by Rituximab versus IFN Maintenance in Elderly Patients with MCL

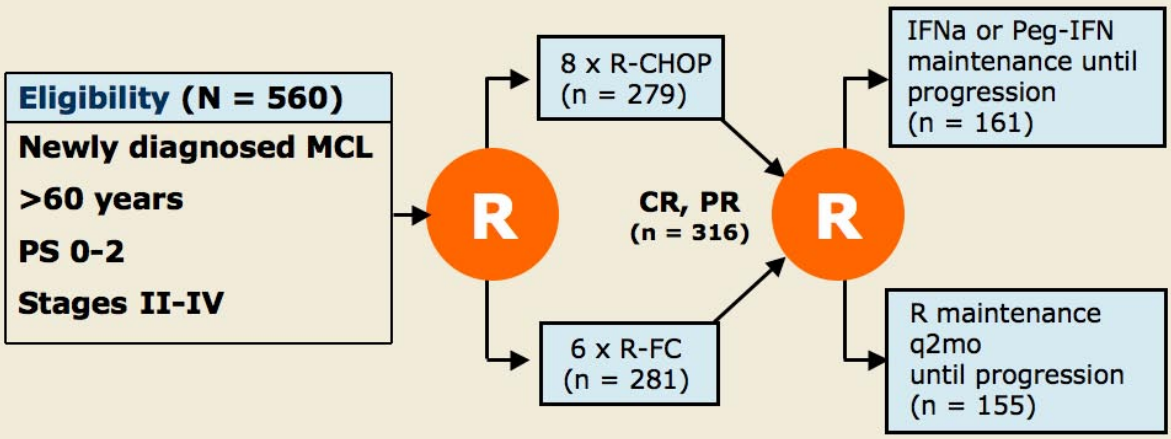
Presentation discussed in this issue

Kluin-Nelemans JC et al. **R-CHOP versus R-FC followed by maintenance with rituximab versus interferon-alfa: Outcome of the first randomized trial for elderly patients with mantle cell lymphoma.** *Proc ASH* 2011;**Abstract 439**.

Slides from a presentation at ASH 2011 and transcribed comments from a recent interview with Stephanie A Gregory, MD (1/11/12)



Study Schema



R = rituximab; CR = complete response; PR = partial response

Kluin-Nelemans HC et al. *Proc ASH* 2011;Abstract 439.

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Efficacy of R-CHOP vs R-FC Induction

	R-CHOP (n = 232)	R-FC (n = 243)	*p*-value
Overall response rate	87%	78%	0.0508
CR/CRu	50%	53%	
PR	37%	25%	
PD	5%	14%	
Median time to treatment failure	28 mo	26 mo	0.52
Median overall survival	77 mo	43 mo	0.0023

Median follow-up 36 months

Kluin-Nelemans HC et al. *Proc ASH* 2011;Abstract 439.

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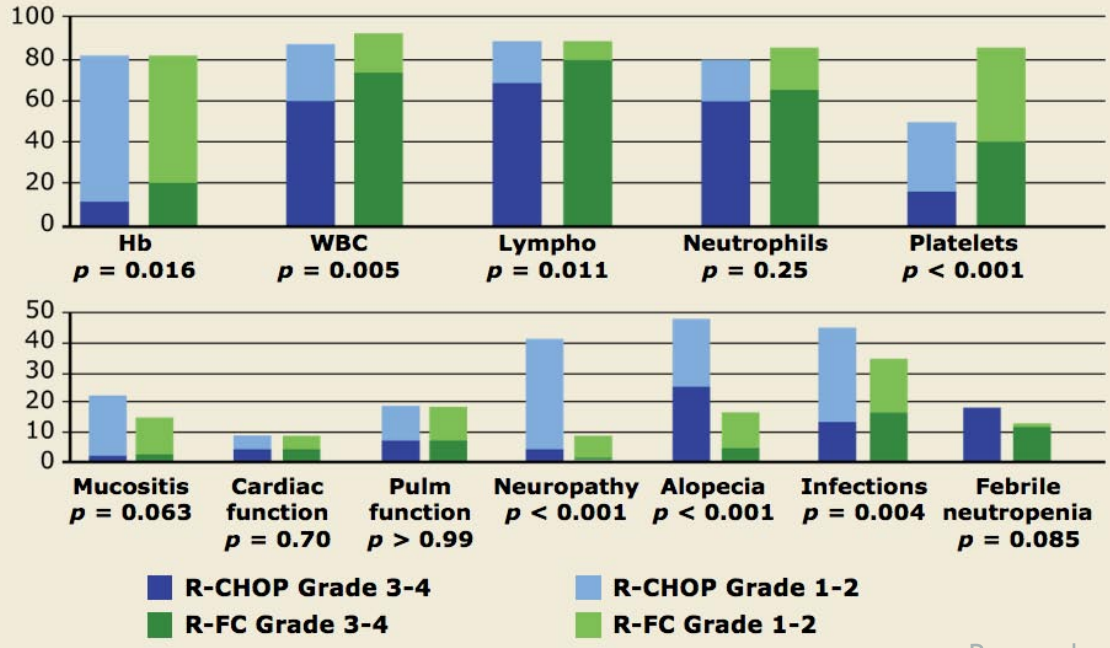
R-CHOP vs R-FC Toxicity



With permission from Kluin-Nelemans HC et al. *Proc ASH* 2011;Abstract 439.

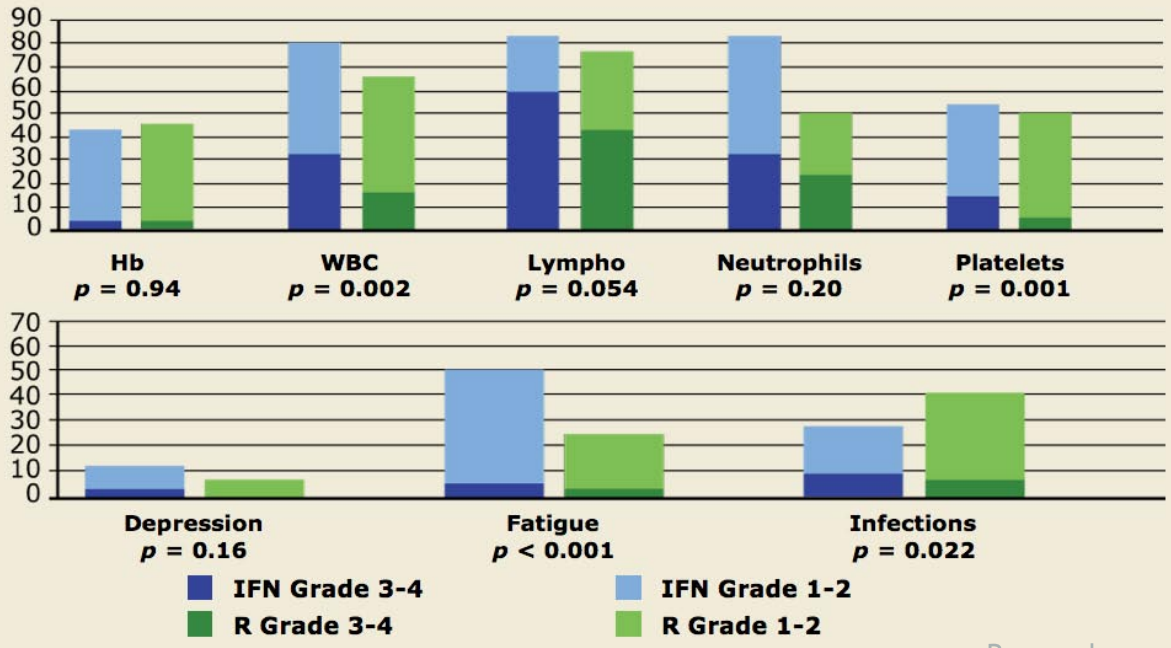
Efficacy of Rituximab vs IFN Maintenance

	Rituximab maintenance (n = 139)	IFN maintenance (n = 128)	Hazard ratio	*p*-value
Remission duration	77 mo	26 mo	0.54	0.0005
Four-year overall survival	77%	65%	—	0.15
Four-year overall survival related to induction regimen				
After R-CHOP	87%	61%	—	0.0058
After R-FC	70%	70%	—	0.5

Median follow-up 36 months

Kluin-Nelemans HC et al. *Proc ASH* 2011;Abstract 439.

Toxicity of IFN and Rituximab



With permission from Kluin-Nelemans HC et al. *Proc ASH* 2011;Abstract 439.

Author Conclusions

- Induction therapy with R-CHOP versus R-FC favors R-CHOP with more overall responses and less toxicity.
- Rituximab maintenance doubles the remission duration in patients responding to initial therapy.
- Patients pretreated with R-CHOP and maintained on rituximab have a 4-year overall survival of 87%.
- Long-term rituximab has low toxicity.
- R-CHOP followed by maintenance rituximab should become the gold standard to which new induction regimens are compared.

Kluin-Nelemans HC et al. *Proc ASH* 2011;Abstract 439.

Investigator Commentary: R-CHOP versus R-FC Followed by Maintenance with Rituximab versus IFN in Elderly Patients with Mantle-Cell Lymphoma (MCL)

Treatment of MCL in elderly patients is a challenge. This study reported that R-CHOP followed by rituximab maintenance is much better than R-FC followed by maintenance with rituximab or IFN. This was an older study — IFN is not being used any more.

R-CHOP followed by rituximab maintenance should be the treatment approach for elderly patients with MCL. For older patients with MCL who do not receive transplants, I do administer rituximab maintenance.

Interview with Stephanie A Gregory, MD, January 11, 2012

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