

Continuing Medical Education (CME) Questions

HLA Abs and platelet refractoriness

To obtain credit, you should first read the journal article. After reading the article, you should be able to answer the following, related, multiple-choice questions. To complete the questions (with a minimum 70% passing score) and earn continuing medical education (CME) credit, please go to <http://www.medscape.org/journal/blood>. Credit cannot be obtained for tests completed on paper, although you may use the worksheet below to keep a record of your answers. You must be a registered user on Medscape.org. If you are not registered on Medscape.org, please click on the “Register” link on the right hand side of the website. Only one answer is correct for each question. Once you successfully answer all post-test questions you will be able to view and/or print your certificate. For questions regarding the content of this activity, contact the accredited provider, CME@medscape.net. For technical assistance, contact CME@webmd.net. American Medical Association’s Physician’s Recognition Award (AMA PRA) credits are accepted in the US as evidence of participation in CME activities. For further information on this award, please refer to <http://www.ama-assn.org/ama/pub/category/2922.html>. The AMA has determined that physicians not licensed in the US who participate in this CME activity are eligible for *AMA PRA Category 1 Credits*[™]. Through agreements that the AMA has made with agencies in some countries, AMA PRA credit may be acceptable as evidence of participation in CME activities. If you are not licensed in the US, please complete the questions online, print the AMA PRA CME credit certificate, and present it to your national medical association for review.

Jackman RP, Deng X, Bolgiano D, Lebedeva M, Heitman JW, Busch MP, Slichter SJ, Norris PJ. Low-level HLA antibodies do not predict platelet transfusion failure in TRAP study participants. *Blood*. 2013;121(16):3261-3266.

- You are seeing a 60-year-old woman with a history of myelodysplasia who has required transfusions with different blood products on multiple occasions over the past 4 years. You note that she had a very poor response to her last transfusion with platelets 1 week ago. What should you consider regarding the possibility of alloimmunization to HLA?**
 - Antibodies (Abs) against HLA develop in ~3% of patients undergoing platelet transfusion
 - HLA Abs usually develop within the first 2 weeks after exposure to blood products
 - HLA Abs always persist for at least 1 year after the transfusion
 - Leukoreduction of platelets eliminates the possibility of alloimmunization
- Which of the following statements regarding human platelet antigen (HPA) and alloimmunization is most accurate?**
 - HPAs are more immunogenic than HLAs
 - HPA Abs are more common among patients who are HLA Ab-positive
 - HPA Abs themselves do not cause refractoriness to transfusions
 - The use of HLA-matched platelets eliminates the risk of refractoriness among patients with HPA Abs
- You suspect that the patient in Question #1 is now alloimmunized. Based on the results of the current study, which of the following statements regarding Abs to HLA and HPA is most accurate?**
 - Newer tests failed to detect a higher prevalence of HLA Ab
 - Higher levels of class II HLA Ab were more predictive of a positive lymphocytotoxicity assay than class I HLA Ab
 - Levels of HPA Ab were low overall
 - There was a strong correlation between the newer and older tests for HPA Ab
- Which of the following findings was significantly predictive of a higher risk of refractoriness to transfusion in the current study?**
 - Any HLA Ab level
 - Only high levels of HLA Ab
 - Any HPA Ab level
 - Only high levels of HPA Ab

Activity Evaluation (where 1 is strongly disagree and 5 is strongly agree)

- The activity supported the learning objectives.

1	2	3	4	5
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- The material was organized clearly for learning to occur.

1	2	3	4	5
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- The content learned from this activity will impact my practice.

1	2	3	4	5
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- The activity was presented objectively and free of commercial bias.

1	2	3	4	5
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