Scientific Research
 Open Access



Search Keywords, Title, Author, ISBN, ISSN

 Home
 Journals
 Books
 Conferences
 News
 About Us
 Jobs

 Indexing
 View Papers
 Aims & Scope
 Editorial Board
 Guideline
 Article Processing Charges
 OJAnes
 Most popular papers in OJAnes

 OJAnes> Vol.2 No.5, November 2012
 OPEN @ACCESS
 About OJAnes News
 Frequently Asked Questions

 Anaphylactoid
 Shock with Infusion of 5% Albumin in a Patient under General Anesthesia
 Frequently Asked Questions
 Frequently Asked Questions

PDF (Size: 55KB) PP. 214-216 DOI : 10.4236/ojanes.2012.25048

## Author(s)

Samer Abdel-Aziz, Esamelden Abdelnaem, Neeraj Kumar, Mohamed Ismaeil

# ABSTRACT

A 61 year old male patient undergoing gastrectomy under general anesthesia developed severe anaphylactoid shock after 15 minutes from starting 5% albumin infusion. His blood pressure went from 101/67 down to 44/23 with his heart rate going up from 91 to 99. A total of 1600 mcg of phenylephrine were given without any improvement in the hemo-dynamics. We then gave 50 mcg of Epinephrine to which blood pressure rapidly responded going up to 141/60 (mean 88). Then 15 mg of Dexamethasone were given. Blood pressure remained stable with the mean between 75 and 90, without requiring anymore pressors. 5% albumin is considered among the safer colloids with a risk of anaphylactoid reactions less than gelatins and dextrans and comparable to starches. However, severe life threatening anaphylaxis has been reported with Albumin infusion. With the still ongoing crystalloid colloid debate, with many studies showing no survival benefit with colloid use for volume resuscitation, the risk of severe anaphylactic shock, even with the safer colloids like albumin should drive to a more conservative use of albumin for volume resuscitation, specially under general anesthesia, when recognizing the signs and symptoms of anaphylaxis and the offending agent maybe more challenging.

## KEYWORDS

Albumin; Colloids; Anaphylaxis; Anesthesia

## Cite this paper

S. Abdel-Aziz, E. Abdelnaem, N. Kumar and M. Ismaeil, "Anaphylactoid Shock with Infusion of 5% Albumin in a Patient under General Anesthesia," *Open Journal of Anesthesiology*, Vol. 2 No. 5, 2012, pp. 214-216. doi: 10.4236/ojanes.2012.25048.

## References

- [1] M. C. Laxenaire, C. Charpentier and L. Feldman, "Anaphylactoid Reactions to Colloid Plasma Substitutes: Incidence, Risk Factors, Mechanisms. A French Multicenter Prospective Study," Annales Fran?aises d' Anesthésie et de Réanimation, Vol. 13, No. 3, 1994, pp. 301-310. doi:10.1016/S0750-7658(94)80038-3
- [2] S. R. Leach, " Cardiovascular Collapse following Infusion of 5% Albumin," American Association of Nurse Anesthetists Journal, Vol. 59, No. 6, 1991, pp. 592-594.
- [3] A. Fujita, M. Kitayama and K. Hirota, "Anaphylactoid Shock in a Patient following 5% Human Serum Albumin Infusion during Off-Pump Coronary Artery Bypass Grafting," Journal of Anesthesia, Vol. 21, No. 3, 2007, pp. 396-398. doi: 10.1007/s00540-007-0512-3
- N. Shimode, H. Yasuoka, M. Kinoshita, K. Hirashima, S. Tsujimoto, C. Tashiro and A. kubunji, " Severe Anaphylaxis after Albumin Infusion in a Patient with Ahaptoglo-binemia," Anesthesiology, Vol. 105, No. 2, 2006, pp. 425-426. doi:10.1097/00000542-200608000-00027
- [5] A. Liberati, L. Moja, I. Moschetti, G. F. Gensini and R. Gusinu, "Human Albumin Solution for Resuscitation and Volume Expansion in Critically III Patients," Internal and Emergency Medicine, Vol. 1, No. 3, 2006, pp. 243-245. doi:10.1007/BF02934748
- [6] S. Finfer, R. Bellomo, N. Boyce, J. French, J. Myburgh and R. Norton, " A Comparison of Albumin and

About Us	;	Jobs
OJAnes Subscription		
Most popular papers in OJAnes		
About OJAnes News		
Frequently Asked Questions		
Recommend to Peers		
Recommend to Library		
Contact Us		
Downloads: 16,0		095
Visits:	65,5	502
Sponsors >>		

Saline for Fluid Resuscitation in the Intensive Care Unit," New England Journal of Medicine, Vol. 350, No. 22, 2004, pp. 2247-2256. doi:10.1056/NEJMoa040232

- [7] Joint Task Force on Practice Parameters, American Academy of Allergy, Asthma and Immunology, American College of Allergy, Asthma and Immunology, and the Joint Council of Allergy, Asthma and Immunology, "The Diagnosis and Management of Anaphylaxis," Journal of Allergy and Clinical Immunology, Vol. 101, 6, 1998, pp. S465-S528.
- [8] J. H. Levy, " Anaphylactic Reactions in Anesthesia and Intensive Care," Butterworth-Heinemann, Stoneham, 1992.
- [9] I. Murat, "Anaphylactic Reactions during Paediatric An-aesthesia; Results of the Survey of the French Society of Paediatric Anaesthetists (ADARPEF)," Paediatric An-aesthesia, Vol. 3, No. 6, 1993, pp. 339-343. doi:10.1111/j.1460-9592.1993.tb00101.x
- [10] M. C. Laxenaire, " Epidemiological Survey of Anaphy-lactoid Reactions Occurring during Anaesthesia. Fourth French Multicentre Survey (July 1994-December 1996)," Annales Fran?aises d' Anesthésie et de Réanimation, Vol. 18, No. 7, 1999, pp. 796-809. doi:10.1016/S0750-7658(00)88460-9
- [11] M. M. Fisher and B. A. Baldo, "The Incidence and Clini-cal Features of Anaphylactic Reactions during Anesthesia in Australia," Annales Fran?aises d'Anesthésie et de Ré-animation, Vol. 12, No. 2, 1993, pp. 97-104. doi:10.1016/S0750-7658(05)81016-0
- [12] P. M. Mertes, M. C. Laxenaire and F. Alla, "Anaphylactic and Anaphylactoid Reactions Occurring during Anesthesia in France in 1999-2000," Anesthesiology, Vol. 99, No. 3, 2003, pp. 536-545. doi:10.1097/00000542-200309000-00007
- [13] T. Harboe, A. B. Guttormsen, A. Irgens, T. Dybendal and E. Florvaag, "Anaphylaxis during Anesthesia in Norway: A 6-Year Single-Center Follow-Up Study," Anesthesiology, Vol. 102, No. 5, 2005, pp. 897-903. doi:10.1097/00000542-200505000-00006
- [14] M. K. Freeman, "Fatal Reaction to Haemaccel," Anaesthesia, Vol. 34, No. 4, 1979, pp. 341-343. doi:10.1111/j.1365-2044.1979.tb04933.x

Home | About SCIRP | Sitemap | Contact Us Copyright © 2006-2013 Scientific Research Publishing Inc. All rights reserved.