wished to make in our Editorial is that the hypothetical risks of anesthetic neurotoxicity should not dictate our choice of regional versus general anesthesia. There is no evidence of the superiority of one approach over the other in terms of clinically relevant outcome. Therefore, the skills and expertise of the anesthesiologists and surgeons should be the main factors behind this strategic decision. In academic centers where teaching is a priority, the duration of even straightforward surgical procedures may often exceed the duration of a single spinal block. Given the importance of adequate analgesia during the entire procedure, general anesthesia, often in combination with a regional blockade, may have obvious advantages in these situations. As Drs. Williams and Sartorelli also point out, up to 20% of children with spinal anesthesia may need additional sedation even in experienced hands. While this situation can be easily handled by experienced pediatric anesthesiologists, failure of spinal anesthesia and the subsequent change in management plan may be more dangerous in less experienced hands. Again, it is the anesthesiologist and not the anesthetic that makes the difference.

### **Competing Interests**

Dr. Vutskits is an Editor of ANESTHESIOLOGY. He served as consultant for Primex (Zug, Switzerland) and Regeneron (Tarrytown, New York). Dr. Culley is an Executive Editor of Anesthesiology. She serves as a Director and Secretary for the American Board of Anesthesiology, Chair of the Academic Anesthesiology Committee for the American Society of Anesthesiology, ex officio Member of the Anesthesiology Review Committee for the Accreditation Council for Graduate Medical Education and as a member of the 3C Committee for American Board of Medical Specialities.

## Research Support

Dr. Culley is supported by the National Institutes of Health (Bethesda, Maryland) and the Department of Anesthesiology, Perioperative, and Pain Medicine, Brigham and Women's Hospital (Boston, Massachusetts). Dr. Vutskits is supported by the Swiss National Science Foundation (Berne, Switzerland) grant No. 31003A-130625.

Laszlo Vutskits, M.D., Ph.D., Deborah J. Culley, M.D. University Hospitals of Geneva, Geneva, Switzerland (L.V.). laszlo.vutskits@hcuge.ch

DOI: 10.1097/ALN.0000000000003281

# References

1. Ing C, Zaccariello MJ, Kirsch AC, Li G, Warner DO: GAS, PANDA, and MASK: Comment. An esthesiology 2020; 132:1587-8

- 2. Williams R, Sartorelli K: GAS, PANDA, and MASK: Comment. Anesthesiology 2020; 132:1588–9
- 3. Vutskits L, Culley DJ: GAS, PANDA, and MASK: No evidence of clinical anesthetic neurotoxicity! Anesthesiology 2019; 131:762-4
- 4. Warner DO, Zaccariello MJ, Katusic SK, Schroeder DR, Hanson AC, Schulte PJ, Buenvenida SL, Gleich SJ, Wilder RT, Sprung J, Hu D, Voigt RG, Paule MG, Chelonis JJ, Flick RP: Neuropsychological and behavioral outcomes after exposure of young children to procedures requiring general anesthesia: The Mayo Anesthesia Safety in Kids (MASK) study. Anesthesiology 2018; 129:89–105
- 5. O'Leary JD, Janus M, Duku E, Wijeysundera DN, To T, Li P, Maynes JT, Crawford MW: A Population-based study evaluating the association between surgery in early life and child development at primary school entry. Anesthesiology 2016; 125:272-9
- 6. Glatz P, Sandin RH, Pedersen NL, Bonamy AK, Eriksson LI, Granath F: Association of anesthesia and surgery during childhood with long-term academic performance. JAMA Pediatr 2017; 171:e163470
- 7. McCann ME, de Graaff JC, Dorris L, Disma N, Withington D, Bell G, Grobler A, Stargatt R, Hunt RW, Sheppard SJ, Marmor J, Giribaldi G, Bellinger DC, Hartmann PL, Hardy P, Frawley G, Izzo F, von Ungern Sternberg BS, Lynn A, Wilton N, Mueller M, Polaner DM, Absalom AR, Szmuk P, Morton N, Berde C, Soriano S, Davidson AJ; GAS Consortium: Neurodevelopmental outcome at 5 years of age after general anaesthesia or awake-regional anaesthesia in infancy (GAS): an international, multicentre, randomised, controlled equivalence trial. Lancet 2019; 393:664-77
- 8. Eger EI 2nd: Dragons and other scientific hazards. Anesthesiology 1979; 50:11

(Accepted for publication February 28, 2020. Published online first on March 26, 2020.)

# **Bacchus Listed for a Liver Transplant: Comment**

# To the Editor:

The American Society of Anesthesiologists' (Schaumberg, for liver transplant anesthesiologists and is actively engaged in educational efforts related to both clinical and ethical approaches to donation after circulatory death. It was thus with surprise and some distress that we read a recent piece which perhaps casts a negative light on the profession and the liver transplantation process. It may also create significant adverse sentiment and publicity, particularly with regard to the precious resource of donor families.<sup>1</sup>

Liver transplant anesthesiologists are involved in the preoperative assessment of liver transplant recipients, which includes objective, data-guided evaluation and listing, including patients with alcoholic liver disease, a recognized indication for liver transplantation.<sup>2,3</sup> Outcomes of liver transplantation due to alcoholic liver disease are comparable to those other indications in the absence of relapse. Most institutions have robust algorithms and policies in place requiring assessment by trained mental health professionals, participation in abstinence programs with mandatory signed contracts, and frequent, unscheduled drug and alcohol testing. Failure to meet these goals usually results in temporary delisting until compliance is guaranteed. Some programs have an alternate pathway for liver transplantation patients with abstinence less than 6 months but have additional requirements in place. These include the pursuit of an abstinence program, strong family support, and appropriate patient insight into their disease. These approaches have limited relapses to heavy drinking to about 2.9% over a median follow-up of 6 yr.4 Professional, empathetic care of patients with any substance abuse disorder is a guiding principle of ethical medical practice and is no different for patients with alcoholic liver disease. Although the risk for recidivism remains in any patient with a substance use disorder, to suggest, as this poem does, that an alcoholic could receive a liver transplant so he can continue drinking is an affront to the ethos guiding the transplant team.

Of greater concern is the implication of mismanagement of precious donor organs gifted by grieving families. Donor families should be confident in the medical judgment and ethical practice of the transplant team to best utilize donor organs based on objective criteria and vigorous screening processes. The apparent disregard for the solemnity and sanctity of the donation process, as suggested in this poem, has a significant risk of disengaging and discouraging donor families from allowing a *second chance* for grateful, sober recipients.

We respect the freedom of expression but are nevertheless disappointed to read this subjective opinion piece in ANESTHESIOLOGY, a highly respected peer-reviewed journal. We are gravely concerned for the potential damaging implications to the transplant community at large, and in particular donor families who may be unaware of processes in place listing and delisting patients with alcoholic liver disease for liver transplantation.

# **Competing Interests**

Dr. Ramsay is a consultant for Masimo Corp. (Irvine, California) Scientific Advisory Board, and has funded research from Masimo Corp. The authors declare no competing interests.

Dmitri Bezinover, M.D., Ph.D., Geraldine Diaz, D.O., Elizabeth Duggan, M.D., Dragos Galusca, M.D., F.C.C.P., F.A.S.A., James D. Kindscher, M.D., Marina Moguilevitch, M.D., Ramona Nicolau-Raducu, M.D., Ph.D., Evan G. Pivalizza, M.B., F.C.M.S.A., Raymond Planinsic, M.D., F.A.S.A., Michael A. E. Ramsay, M.D., F.R.C.A., David M. Rosenfeld, M.D., Nikolaos Skubas, M.D., F.A.S.E., Gebhard Wagener, M.D. Penn State Milton S. Hershey Medical Center, Hershey, Pennsylvania (D.B.). dbezinover@pennstatehealth.psu.edu

All authors are members of the American Society of Anesthesiologists' Committee on Transplant Anesthesia.

DOI: 10.1097/ALN.00000000000003228

#### References

- 1. Hester DL. Bacchus listed for a liver transplant. Anesthesiology 2019; 131:1192
- Beresford TP, Lucey MR: Towards standardizing the alcoholism evaluation of potential liver transplant recipients. Alcohol Alcohol 2018; 53:135–44
- 3. Evaluation for Liver Transplantation in Adults: 2013 Practice Guideline by the AASLD and the American Society of Transplantation. Available at: https://www.aasld.org/sites/default/files/2019-06/141020\_Guideline\_Evaluation\_Adult\_LT\_4UFb\_2015.pdf. Accessed June 20, 2019.
- 4. Kodali S, Kaif M, Tariq R, Singal AK: Alcohol relapse after liver transplantation for alcoholic cirrhosis-Impact on liver graft and patient survival: A meta-analysis. Alcohol Alcohol 2018; 53:166–72

(Accepted for publication February 7, 2020. Published online first on March 25, 2020.)

# **Bacchus Listed for a Liver Transplant: Comment**

# To the Editor:

As physicians and members of the Council of the Liver Intensive Care Group of Europe (LICAGE), we read with great concern the poem by Dr. Hester recently published in ANESTHESIOLOGY.<sup>1</sup>

It is our strong opinion that such a contribution has nothing to do with "Creative writing that explores the abstract side of our profession and our lives."

We think that Dr. Hester's paper ignores not only the suffering of our patients or the transplant community's efforts to offer them a reliable and long-lasting treatment, but also the current evidence and practice. In fact, liver transplantation is the only cure for end-stage alcoholic liver disease, which remains a common indication for this procedure worldwide.<sup>2-7</sup> Transplant centers commonly require at least 6 months of alcohol abstinence before patients can be listed for liver transplantation. In fact, the 1993 Consensus Conference of Paris recognized an abstinence of 3 to 6 months as a good predictor of alcohol relapse avoidance.<sup>2</sup> This period not only gives physicians a possibility to review if the patient's liver resumes function on its own in the absence of alcohol, but also is an opportunity for the patient to demonstrate how strong their intention is to stay sober after the surgery.

We have evidence that excellent results can occur when liver transplantation is performed after 6 months of alcohol abstinence.5 However, for patients whose hepatitis did not respond to standard medical therapy, the 6-month survival rate was approximately 30%, with most of the alcoholic hepatitis deaths occurring within 2 months.<sup>5</sup> Mathurin et al.<sup>7</sup> evaluated if early liver transplantation (with alcohol abstinence less than 6 months) is associated with survival benefits among patients with severe alcoholic hepatitis. Twenty-six patients with severe alcoholic hepatitis, at high risk of death (median Lille score, 0.88), were transplanted. The cumulative 6-month survival rate was higher among patients who received early liver transplantation in comparison to controls who did not receive liver transplantation (77% ± 8% vs. 23% ± 8%, P < 0.001). This benefit of early transplantation was maintained through 2 years of follow-up (hazard ratio, 6.08; P = 0.004). Three patients resumed drinking alcohol, one at 720 days, one at 740 days, and one at 1,140 days after transplantation. The authors concluded that the low rate of alcohol relapse was probably related to the careful selection of recipients. More recently, Im et al.4 performed a similar study in the United States. Early liver transplantation, in selected patients with severe alcoholic hepatitis, resulted in improved outcomes. Also, Lee et al.,3 in a retrospective analysis of 147 patients who underwent early liver transplantation for severe alcoholic liver disease, found patient survival for 1 (94%) and 3 yr (84%) similar to that for patients receiving liver transplantation for other indications. The authors stated that the alcohol use after liver transplantation was infrequent but associated with increased mortality, supporting the use of liver transplantation as a treatment for severe alcoholic liver disease.

Liver transplantation for alcoholic liver disease has always remained a complicated topic from both medical and ethical points of view, as it is seen for many a "self-inflicted disease," where the main concerns remain the chance of alcohol intake relapse after liver transplantation, which has been reported to be from 7 to 95%. The significant differences among data can be explained by differences in the use of terms "recidivism" and "relapse," which some studies utilize to define any alcohol intake, and heavy drinking. Relapse to "harmful drinking" has been reported in 8 to 21% of liver transplantation recipients, and occasional drinks may not cause significant graft damage.

However, with a history of alcoholism, it would be difficult to predict an outcome and magnitude of posttransplant alcohol abuse.<sup>5</sup> Nevertheless, it is clear that, due to the current organ shortage, priority should be given to patients with high probability of success. For alcoholic liver disease, abstinence before and after liver transplantation may be reinforced by the implementation of strict clinical and laboratory screening for alcohol relapses as well as strong support groups, along with strong social support and closer follow-up. The selection criteria should strongly emphasize the importance of the family environment, good social structure, and family counseling.<sup>5</sup> We think that all of these patients and families deserve the same respect as any other patient while they walk the hard road to redemption from alcohol abuse.

Several questions remain to be answered regarding liver transplantation for alcoholic liver disease. We strongly believe that physicians should address these questions with compassion, with empathy, and based on the available evidence.

### **Competing Interests**

Dr. Reyntjens is a member of the KOL Group on perioperative temperature management. The other authors declare no competing interests.

Fuat H. Saner, M.D., Gianni Biancofiore, M.D., Koen Reyntjens, M.D., Catherine Paugam Burtz, M.D., Annabel Blasi, M.D., Robert Broomhead, M.D., Dana Tomescu, M.D. Medical Center University Duisburg-Essen, Essen, Germany (F.H.S.). fuat. saner@uni-due.de

All authors are members of the Liver Intensive Care Group of Europe (LICAGE).

DOI: 10.1097/ALN.0000000000003229

### References

- 1. Hester DL: Bacchus listed for a liver transplant. Anesthesiology 2019; 131:1192
- 2. Lucey MR: In patients with a first episode of severe alcoholic hepatitis non-responsive to medical therapy, early liver transplant increases 6-month survival. Evid Based Med 2013; 18:21–2
- Lee BP, Mehta N, Platt L, Gurakar A, Rice JP, Lucey MR, Im GY, Therapondos G, Han H, Victor DW, Fix OK, Dinges L, Dronamraju D, Hsu C, Voigt MD, Rinella ME, Maddur H, Eswaran S, Hause J, Foley D, Ghobrial RM, Dodge JL, Li Z, Terrault NA: Outcomes of early liver transplantation for patients with severe alcoholic hepatitis. Gastroenterology 2018; 155:422–30.e1
- 4. Im GY, Kim-Schluger L, Shenoy A, Schubert E, Goel A, Friedman SL, Florman S, Schiano TD: Early liver transplantation for severe alcoholic hepatitis in the United States—A single-center experience. Am J Transplant 2016; 16:841–9

- 5. Leon M, Varon J, Surani S: When a liver transplant recipient goes back to alcohol abuse: Should we be more selective? World J Gastroenterol 2016; 22:4789–93
- 6. Bismuth H: Consensus statement on indications for liver transplantation: Paris, June 22-23, 1993. Hepatology 1994; 20:63S–8S
- Mathurin P, Moreno C, Samuel D, Dumortier J, Salleron J, Durand F, Castel H, Duhamel A, Pageaux GP, Leroy V, Dharancy S, Louvet A, Boleslawski E, Lucidi V, Gustot T, Francoz C, Letoublon C, Castaing D, Belghiti J, Donckier V, Pruvot FR, Duclos-Vallée JC: Early liver transplantation for severe alcoholic hepatitis. N Engl J Med 2011; 365:1790–800

(Accepted for publication February 7, 2020. Published online first on March 25, 2020.)

# **Bacchus Listed for a Liver Transplant: Comment**

# To the Editor:

s the directors of liver transplant anesthesia and transplant surgery, and the medical director of the liver transplant program, we were deeply concerned and disappointed to read "Bacchus Listed for a Liver Transplant" published in Anesthesiology, June 11, 2019. The poem envisions an alcoholic cirrhotic patient as Bacchus, the Roman god of wine, drunkenly awaiting his upcoming liver transplant, undeserving of the gift he is about to receive. This piece does a disservice to all patients with end-stage liver disease, regardless of etiology, and harms the entire transplant community—patients, donor families, and their medical teams. Patients require liver transplantation for a variety of reasons, not just alcoholic cirrhosis. To suggest otherwise is to stigmatize all transplant recipients and potential recipients. Furthermore, to depict patients with alcoholic liver disease like Bacchus, frivolously drinking and unperturbed by the consequences, is patient shaming.

Multiple protocols are in place to ensure that potential organ recipients are not only eligible but will be stewards of the organs gifted to them. Before being listed for liver transplantation, patients with alcoholic liver disease must abstain from alcohol and drugs for several months, visit with transplant social workers who assess risk of recidivism, show evidence of ongoing participation in Alcoholics Anonymous or other recovery groups, and have significant support systems.<sup>2</sup>

The implication that our patients are unappreciative of donors' gifts is disrespectful both to transplant recipients and

to families of organ donors. Organ donors are truly giving the gift of life. Liver transplant recipients have a high survival rate and frequently are able to return to a high quality of life and even return to active employment. Moving stories of gratitude from transplant recipients can be found on the United Network for Organ Sharing website and are widespread throughout the media.<sup>3,4</sup> In addition to the disrespect to donor families and transplant patients, this piece may potentially cause great harm to the entire field of transplantation by discouraging future donation. Finally, this piece discredits the work of all transplant healthcare professionals, many of whom are readers of ANESTHESIOLOGY, and who devote countless hours and sleepless nights to caring for these patients. We are privileged to care for transplant patients in some of their most difficult hours. Like the opioid epidemic, alcoholic liver disease is a widespread global cause of morbidity and mortality,5 and patients suffering from this disease deserve our help and support. Shaming our patients is contrary to our professional ethics as physicians, and we are disheartened that this piece was published in our national society's journal. We should strive to be advocates for our patients instead of mocking them.

### **Competing Interests**

The authors declare no competing interests.

Kate Kronish, M.D., Chris E. Freise, M.D., F.A.C.S., Francis Y. Yao, M.D. University of California San Francisco, San Francisco, California (K.K.). Kate.kronish@ucsf.edu

DOI: 10.1097/ALN.0000000000003230

### References

- 1. Hester DL: Bacchus listed for a liver transplant. Anesthesiology 2019; 131:1192
- 2. Godfrey EL, Stribling R, Rana A: Liver transplantation for alcoholic liver disease: An update. Clin Liver Dis 2019; 23:127–39
- 3. United Network for Organ Sharing: Stories of Hope. Available at: https://unos.org/transplant/stories-of-hope/. Accessed June 17, 2019.
- 4. Donate Life America. Available at: https://www.donatelife.net/stories/. Accessed June 17, 2019.
- Marroni CA, Fleck AM Jr, Fernandes SA, Galant LH, Mucenic M, de Mattos Meine MH, Mariante-Neto G, Brandão ABM: Liver transplantation and alcoholic liver disease: History, controversies, and considerations. World J Gastroenterol 2018; 24:2785–805

(Accepted for publication February 7, 2020. Published online first on March 25, 2020.)

# **Bacchus Listed for a Liver Transplant: Comment**

# **Bacchus Listed for a Liver Transplant: Comment**

# To the Editor:

The International Liver Transplantation Society (Fredericksburg, Virginia) was disappointed to learn about "Bacchus Listed for a Liver Transplant," published in the journal's Mind to Mind section.<sup>1</sup>

The piece misrepresents and stigmatizes patients with end-stage liver disease regardless of etiology. It shames our patients at the most vulnerable time when they seek help from healthcare professionals and transplantation is their only choice for survival. Healthcare professionals should not judge patients, regardless of whether they have a history of alcohol abuse, nonalcoholic steatohepatitis due to obesity, opioid dependence, or any other condition.

It discredits healthcare professionals caring for patients with end-stage liver disease by implying that no appropriate medical and psycho-social evaluation is performed in order to receive a liver transplant, when in fact the opposite is true.

Last, it belittles the altruism of organ donors, whether deceased (brain-dead), donors after cardiac death, or living donors. These donors give the ultimate gift to society. We must maintain public trust in the process of donation that helps all patients with end-stage organ disease. The false perception that an organ might be wasted undermines this public trust.

This is an opportunity to educate your readership (most of them are likely unfamiliar with the transplant process). It is sincerely hoped that the journal will take up the challenge.

#### **Competing Interests**

The author declares no competing interests.

Claus U. Niemann, M.D., International Liver Transplantation Society, Fredericksburg, Virginia. president@ilts.org

DOI: 10.1097/ALN.0000000000003231

## Reference

1. Hester DL: Bacchus listed for a liver transplant. Anesthesiology 2019; 132:1594

(Accepted for publication February 7, 2020. Published online first on March 25, 2020.)

# To the Editor:

Having written and published poetry for many years after two English degrees and one creative writing Fellowship that is much more famous than I am, I for one, am always ready to read creative pieces written by physicians. But I'm not sure what "Bacchus Listed for a Liver Transplant" is.

It isn't a poem. There is no elevated language here, no attention to the rhythm of the words, only the mundane language of an uninformed letter to the editor. Good Art, like good Science, is an investigative tool—see the first chapter of my most recent Oxford book.<sup>3</sup>

The content of "Bacchus Listed" is remarkably ignorant of the mythological understanding of the Bacchus legend. See Joseph Campbell's *The Hero with a Thousand Faces*<sup>4</sup> and others on Dionysos, the earlier Greek version of the Latin Bacchus. And it is likewise ignorant of the transplant listing process: no one who is actively drinking as portrayed will be listed in a reputable program.<sup>5</sup>

It isn't literature because it is free of human compassion. Contrast it to the works by other physicians like William Carlos Williams who couldn't write in verse but gave us fine images, or Henry Vaughan who could do both. In Nashville, the writer's local area, the work of Alan Tate, John Crowe Ransom, or Merrill Moore—another physician—may be of use. John Stone, M.D., has some fine pieces further south.

Nor is it science: it portrays only an uninformed stereotype of what alcoholism really is.<sup>6</sup> For example, if 100 Bacchuses drank heavily, only 15% would acquire liver cirrhosis. About 35 to 40% of alcoholic persons will find their way to sobriety each year, and studies document remarkably high rates of abstinence among alcoholics after liver transplant. This last finding led my associates and me to investigate the effects of immunosuppressants—commonly given after transplant—on alcohol drinking.<sup>7</sup> What stereotype would all of these data support?

There seems to be another stereotype in effect here: that Art does not require precision of thought, or put another way, that the artist is free from doing appropriate homework. This, of course, is never the case, in literature or in science.

#### **Competing Interests**

The views expressed in this article are those of the author and do not necessarily reflect the position or policy of the Department of Veterans Affairs or the United States government. The author declares no competing interests.

Thomas Beresford, M.D., School of Medicine, University of Colorado Denver, and Rocky Mountain Regional Veterans Affairs Medical Center, Aurora, Colorado. thomas.beresford@ cuanschutz.edu

DOI: 10.1097/ALN.0000000000003232

#### References

- 1. Beresford TP: Poetry and medicine. Pharos Alpha Omega Alpha Honor Med Soc 1979; 42:8–10
- 2. Hester DL: Bacchus listed for a liver transplant. Anesthesiology 2019; 131:1192
- Beresford TP: Psychological Adaptive Mechanisms: Ego Defense Recognition in Practice and Research. New York, Oxford University Press, 2012
- 4. Campbell J:The Hero with a Thousand Faces. 3rd edition. Novato, California, New World Library, 2008
- 5. Beresford TP, Lucey, MR: Introduction to the special issue on alcohol and liver transplantation. Alcohol Alcohol 2018; 53:131–3
- 6. Beresford TP, Lucey MR: Towards standardizing the alcoholism evaluation of potential liver transplant recipients. Alcohol Alcohol 2018; 53:135–44
- 7. Ronan PJ, Strait SA, Palmer GM, Beresford TP: Central administration of cyclosporine A decreases ethanol drinking. Alcohol Alcohol 2018; 53:193–9

(Accepted for publication February 7, 2020. Published online first on March 25, 2020.)

# **Bacchus Listed for a Liver Transplant: Comment**

# To the Editor:

Members of the Society for the Advancement of Transplant Anesthesia (Miami, Florida) read "Bacchus Listed for a Liver Transplant" with considerable interest. We understand this piece was intended as "creative expression" and anticipate all publications in a scientific journal still adhere to accepted principles of scholarly review, and that artistic privilege plays on the imagery and presentation of a

topic to enrich our understanding in substantial and meaningful ways. But good creative expression doesn't misrepresent the facts. This prose fails scientific scrutiny as it misleads the reader by painting a picture of irreverent patients and a derelict transplant system that is simply wrong.

There is a wealth of literature on selection criteria and outcomes that gives a true perspective of patients with alcoholic liver disease. These confirm that liver transplant is a bridge to a lifelong commitment of behavioral and social recovery for the majority of patients.<sup>2</sup> Prospective studies show that within 5 yr of transplant only 20% of patients return to harmful drinking; physicians continue to improve those numbers by using better tools to manage alcohol addiction and predict relapse.<sup>3,4</sup> Survival rates in patients with liver disease after transplantation are similar to those with liver disease due to other causes. These outcomes exceed many equally resource-intensive cancer treatments.

The transplant system uses a transparent consensus building process that invites comment from all members participating in patient care and the public. We encourage those unfamiliar with the details of the transplant system and governance to visit https://unos.org/ where readers can appreciate the tireless work that transplant professionals do to serve the best interest of their patients and the American public. Organ donation distinguishes our specialty from other medical practices by the intense public trust and individual altruism that motivates grieving families to give "the gift of life" to another who is suffering. These facts should invigorate and motivate us whether these practices involve each of us in the care of these patients or not.

We provide quite a different perspective than the cynical and disturbing picture painted by the prose "Bacchus Listed for a Liver Transplant." From our creative expression, we present a picture painted with scientific evidence that highlights a positive outlook for many with alcoholic liver disease. The canvas reflects a culture of courage and trust in our system and care providers for all-comers to critically appraise.

We believe the misleading picture presented in a single prose piece such as this one highlights why all publications in scientific journals need a reliable and transparent review process that holds authors responsible for the accuracy of their information, even for that used in creative pieces. As transplant anesthesiologists wedged in the middle of this debate, it is apparent to us that these types of misperceptions are probably best prevented by a stronger and more involved working relationship between anesthesiology and transplant surgery.

### Acknowledgments

All authors are members of the Executive Council of The Society for the Advancement of Transplant Anesthesia (SATA): M. Susan Mandell, M.D., Ph.D., SATA President (Department of Anesthesiology, University of Colorado, Aurora, Colorado); Tetsuro Sakai, M.D., Ph.D., SATA President-Elect

(Department of Anesthesiology, University of Pittsburgh Medical Center, Pittsburgh, Pennsylvania); Gebhard Wagener, M.D., SATA Secretary (Department of Anesthesiology and Critical Care, Columbia University, New York, New York); Lorenzo De Marchi, M.D., SATA Treasurer (Department of Anesthesiology, Georgetown University, Washington D.C.), Ryan Chadha, M.D., SATA Councilor at Large (Department of Anesthesiology, Mayo Clinic, Jacksonville, Florida); Jiapeng Huang, M.D., Ph.D., SATA Councilor at Large (Department of Anesthesiology, Kentucky One Health, Louisville, Kentucky); Kathirvel Subramanian, M.D., SATA Councilor at Large (University of Pittsburgh Medical Center, Pittsburgh, Pennsylvania); and Jeron Zerillo, M.D., SATA Councilor at Large (Department of Anesthesiology, Icahn School of Medicine at Mount Sinai, New York, New York).

### **Competing Interests**

Dr. Sakai reports the following financial relationships: Instrumentation Laboratory Company (Bedford, Massachusetts; consultation), Spring Publishing Company (New York, New York; textbook royalty), and Siemens, Inc. (Munich, Germany; sponsored lecture). The other authors declare no competing interests.

M. Susan Mandell, M.D., Ph.D., Tetsuro Sakai, M.D., Ph.D., Gebhard Wagener, M.D., Lorenzo De Marchi, M.D., Ryan M. Chadha, M.D., Jiapeng Huang, M.D., Ph.D., Kathirvel Subramanian, M.D., Jeron Zerillo, M.D. University of Colorado, Aurora, Colorado (M.S.M.). Susan.Mandell@cuAnschutz.edu

DOI: 10.1097/ALN.0000000000003233

#### References

- 1. Hester DL: Bacchus listed for a liver transplant. Anesthesiology 2019; 131:1192
- Martin P, DiMartini A, Feng S, Brown R Jr, Fallon M: Evaluation for liver transplantation in adults: 2013 practice guideline by the American Association for the Study of Liver Diseases and the American Society of Transplantation. Hepatology 2014; 59:1144–65
- 3. DiMartini A, Day N, Dew MA, Javed L, Fitzgerald MG, Jain A, Fung JJ, Fontes P: Alcohol consumption patterns and predictors of use following liver transplantation for alcoholic liver disease. Liver Transpl 2006; 12:813–20
- Lim J, Sundaram V: Risk factors, scoring systems, and interventions for alcohol relapse after liver transplantation for alcoholic liver disease. Clin Liver Dis (Hoboken) 2018; 11:105–10

(Accepted for publication February 7, 2020. Published online first on March 25, 2020.)

# **Bacchus Listed for a Liver Transplant: Comment**

# To the Editor:

Recently, Hester published a sonnet entitled "Bacchus Listed for a Liver Transplant." I believe the intent of this poem was to convey the remarkable but also complex nature of transplant medicine. I have been a liver transplant anesthesiologist for the past 13 yr. More significantly, my husband is a recent liver transplant recipient and the subject matter strikes exceedingly close to home. I understand the importance for physicians to use creative writing as a means to communicate our experiences. However, after reflecting on my interpretation of this poem, I feel obligated to refute the misconceptions it conveys regarding liver disease and organ donation.

Alcohol use disorder is a diagnosis supported by neurobiological effects on brain physiology, with both genetic and environmental factors influencing its etiology.<sup>2</sup> It is *not* a character flaw. Perpetuating the stigma attached to alcohol use disorder and alcoholic liver disease contradicts our duty as physicians and fails to recognize the consequences of the disease.

The burden of alcohol use disorder vastly impacts society in terms of lost workforce productivity, healthcare costs, disability, and mortality.3 As physicians, we care for patients on a daily basis who are affected directly and indirectly by this disease. The personal impact of alcoholic liver disease on patients and their families is considerable and can seem insurmountable at times, particularly when facing barriers associated with the liver transplant evaluation process. Physician bias, equity of access, and abstinence from alcohol are a few of these barriers.4 Although some centers are performing transplants for patients with severe alcoholic hepatitis, most continue to require a minimum of 6 months of abstinence before consideration for liver transplant evaluation.5 The uncertainty of whether or not your loved one will survive 6 months to be placed on the transplant waitlist is daunting. The feeling of powerlessness is indescribable.

Geographic disparities in organ allocation and the implementation of a new liver distribution policy is a highly debated topic within the liver transplant community. The litigation surrounding this policy has received recent media coverage. As public awareness of this debate increases, it is imperative to maintain their trust. Public attitudes are a crucial component when establishing organ allocation policy.<sup>6</sup> Organs are a scarce and life-saving resource and attracting negative exposure to organ donation is counterproductive.

This poem is a misguided representation of patients with liver disease and oversimplifies the transplantation process. It minimizes the true hardship, challenges, and emotional turmoil that patients and their loved ones endure. It also fails to acknowledge the overwhelming responsibility of the liver transplant selection committee which makes difficult decisions, especially in situations of alcohol recidivism. Most importantly, organ donor families deserve our highest respect and their altruistic gift must never be discredited.

### **Competing Interests**

The author declares no competing interests.

Amy C. Robertson, M.D., Vanderbilt University School of Medicine, Nashville, Tennessee. amy.robertson@vumc.org

DOI: 10.1097/ALN.0000000000003234

#### References

- 1. Hester DL: Bacchus listed for a liver transplant. Anesthesiology 2019; 131:1192
- 2. Prom-Wormley EC, Ebejer J, Dick DM, Bowers MS: The genetic epidemiology of substance use disorder: A review. Drug Alcohol Depend 2017; 180:241–59
- Axley PD, Richardson CT, Singal AK: Epidemiology of alcohol consumption and societal burden of alcoholism and alcoholic liver disease. Clin Liver Dis 2019; 23:39–50
- 4. Marroni CA, Fleck AM Jr, Fernandes SA, Galant LH, Mucenic M, de Mattos Meine MH, Mariante-Neto G, Brandão ABM: Liver transplantation and alcoholic liver disease: History, controversies, and considerations. World J Gastroenterol 2018; 24:2785–805
- Singal AK, Bataller R, Ahn J, Kamath PS, Shah VH: ACG clinical guideline: Alcoholic liver disease. Am J Gastroenterol 2018; 113:175–94
- 6. O'Dell HW, McMichael BJ, Lee S, Karp JL, Van Horn RL, Karp SJ: Public attitudes toward contemporary issues in liver allocation. Am J Transplant 2019; 19:1212–7

(Accepted for publication February 7, 2020. Published online first on March 25, 2020.)

# **Bacchus Listed for a Liver Transplant: Reply**

In Reply:

Grateful for the opportunity to dialogue regarding my sonnet, I must first express my complete shock at its

reception.<sup>1–7</sup> Throughout my poem's<sup>8</sup> multiyear evolution in creative writing workshops and then through this journal's peer-review process, nothing of this sort was mentioned by anyone.

Clearly, something was missed.

If this poem shames patients, it is wrong. If this poem perpetuates bad science, it is wrong. If this poem damages the transplant process, it is wrong. If this poem discourages patients and families from considering such a gift, it is wrong.

By wrong, I mean both a professional failure and a moral violation. Regardless of my intentions, the interpretations and accusations in the preceding letters weigh very heavily.

During classes for my master's degree in creative writing, this poem was conceived in a series of sonnets about how mythologic characters might interact with the contemporary American healthcare system. My purpose in writing this one was to explore the wonder, gratitude, and sadness I experience when providing the anesthetic care for organ procurement and (nonliver) transplantation. I find the surgical techniques and medical immunomodulation astounding. The nobility of organ donors humbles me. But as life-giving as these procedures are for some, I am sad that the only reason most organs are available is because the original users no longer need them. These three things—the science, the second chances, and the sadness—were my meditation.

Limited by the constraints of sonnet form (14 lines mostly in iambic pentameter, a particular rhyme scheme, a volta that helps synthesize two ideas or moods presented, among others) and my skill set as a poet, I wrote the best piece I could at that time. Like Rorschach blot tests, our creations—and interpretations—are based on our experiences, our beliefs, our professional interests, our pet peeves, our lifetime's reading, and the rest of our lives' experiences.

Although not first stated by Davidson and Fraser, they succinctly capture this idea when describing poetry as *dialogical*, meaning poems rely "for their significance on both writer and reader, and thus [are] never totally conclusive or singular" in contrast to being "receptacles of pre-conceived meanings or planned-out topics." They also write, "Seeing poems as essentially devoid of social, political, or historical value—as merely modes of self-expression—severely limits the power of poetry to 'speak out' and converse with the wider world... Creative writing continually reflects and refracts larger cultural realities and concerns."

Some readers saw "realities and concerns" that they felt should have been directly addressed in my poem, although these were not my focus of the poem at the time of its writing. I was trying to get inside the head of a 6,500-yr-old demigod associated with the vine, wondering how he would respond to the sadness of a donor dying. However much I might regret the distress this poem caused, I cannot change that.

But I myself have been changed. I could not now write without being more sensitive to the myriad of issues raised in these letters. This is one of the ways art works. Over a given piece, readers and artists converse, although it is rarely this explicit. This poem has connected people worldwide, and that speaks of the value the creative arts can add in a medical journal. *JAMA* and *Annals of Internal Medicine* have had a creative section for decades.

Dr. Robertson<sup>7</sup> mentioned the ongoing lawsuit in the United States about liver allocation. Science will never answer that question for us. Science offers no epistemology for ethics, beauty, kindness or—regarding organ allocation—justice. The arts are one tool that enables us to consider other perspectives, explore our emotions about issues, persuade others of our positions, and relate as individuals.

These abilities are important for physicians. Reading and writing poetry help me to do them. Despite the white coat, I am no different than any of my patients. I am just as mortal, just as fallible, and just as needy. I hope I treat each of my patients with the dignity and respect each deserves as a fellow creature.

## **Competing Interests**

The author declares no competing interests.

Doug Hester, M.D., M.F.A., Vanderbilt University Medical Center, Nashville, Tenneessee. doug.hester@vumc.org

DOI: 10.1097/ALN.0000000000003227

### References

- Bezinover D, Diaz G, Duggan E, Galusca D, Kindscher JD, Moguilevitch M, Nicolau-Raducu R, Pivalizza EG, Planinsic R, Ramsay MAE, Rosenfeld DM, Skubas N, Wagener G: Bacchus listed for a liver transplant: Comment. Anesthesiology 2020; 132:1590-1
- 2. Saner FH, Biancofiore G, Reyntjens K, Burtz CP, Blasi A, Broomhead R, Tomescu D: Bacchus listed for a liver transplant: Comment. Anesthesiology 2020; 132:1591–3
- 3. Kronish K, Freise CE, Yao FY: Bacchus listed for a liver transplant: Comment. ANESTHESIOLOGY 2020; 132:1593
- 4. Niemann CU: Bacchus listed for a liver transplant: Comment. Anesthesiology 2020; 132:1594
- 5. Beresford T: Bacchus listed for a liver transplant: Comment. Anesthesiology 2020; 132:1594–5
- 6. Mandell MS, Sakai T, Wagener G, De Marchi L, Chadha RM, Huang J, Subramanian K, Zerillo J: Bacchus listed for a liver transplant: Comment. Anesthesiology 2020; 132:1595–6
- 7. Robertson AC: Bacchus listed for a liver transplant: Comment. Anesthesiology 2020; 132:1596–7
- 8. Hester DL: Bacchus listed for a liver transplant. Anesthesiology 2019; 131:1192

9. Davidson C, Fraser G: Writing Poetry: Creative and Critical Approaches, New York, Palgrave Macmillan, 2009, pp 70–114

(Accepted for publication February 7, 2020. Published online first on March 25, 2020.)

# **Transversus Abdominis Plane Block: Comment**

# To the Editor:

The recent narrative review by Tran et al.1 comprehen-L sively outlining the transversus abdominis plane block is a welcome addition to the literature. Surprisingly, however, the review identified very few indications where the transversus abdominis plane block may actually have any potential clinical benefit. Indeed, Tran et al. suggest that open appendectomy (as relatively uncommon as those are), Cesarean delivery in the absence of any intrathecal opiates (also uncommon), and potentially open colorectal operations when contraindications preclude the use of the clearly superior thoracic epidural option, represent very few firm indications for its use. That said, the block appears to have considerable potential, and Tran et al. also outline a wide-ranging number of areas that warrant further investigation. In doing so, they emphasize that adequately powered and well-designed clinical trials are needed to compare the transversus abdominis plane block with a number of potentially important comparators, including the newer proximal interfacial plane blocks (e.g., erector spinae plane block).

However, an important consideration that was missing from the article was the lack of any specific mention of the end points that should be included in potential future trials. That is, for these trials to be adequately powered, there needs to be careful consideration as to what end points should be measured and compared. Indeed, Myles et al.2 recently reported in their systematic review and consensus analysis of what the important patient comfort outcomes should be. Whereas Tran et al. do state that "hard outcomes" such as length of stay—which is unlikely to be affected after appendectomy—should be reported in transversus abdominis plane bock studies, there are likely many more relevant outcomes that should be considered. Even if they are well-designed, conducting trials that simply investigate short-term (less than 24-h) pain assessments and/ or opiate requirements, which arguably are rather poor