

A SURVEY EVALUATING BURNOUT, HEALTH STATUS, DEPRESSION, ALCOHOL AND SUBSTANCER USE AND SOCIAL SUPPORT AMONG ASRA MEMBERS

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INTRODUCTION

- The main components of an anesthesiologist's job (complex vigilance, monitoring, and dynamic decision making) are particularly susceptible to effects from a variety of factors including the work environment itself, human components and interactions, and the human-machine interface necessary to the job.
- Pain management doctors are additionally burdened with the task of inter-personal relationships with their patients—a situation that may cause increased stress for these providers. We have published data on the risk of burnout in anesthesiologists-at-large, but never in the specific area of pain management.
- We will also assess the level of job satisfaction and how much. Additionally, we will assess what they do in their non-work-time to help them cope with the work-time stress.

HYPOTHESIS

- Purpose is to assess in ASRA Members the risk factors for
 - Job burnout
 - Depression
 - Substance use
 - Health Problems
 - Job satisfaction and social support
 - Social support from their supervisors and colleagues
 - Non-work-time diversions

METHODS

- IRB approved anonymous electronic survey (REDCAP system)
 - Sent by the ASRA office to ASRA Members
- Study Instruments
 - **Maslach Burnout Inventory-Human Services Survey (MBI-HSS)¹**
 - **Calculates Emotional Exhaustion (EE), Depersonalization (DP), and Personal accomplishment (we use the inverse and call it Lack of personal accomplishment LPA)**
 - **National Survey on Drug Use and Health (NSDUH)**
 - **Tested most common drugs including tobacco, alcohol, marijuana**
 - **Social Support and Personal Coping – 24 (SSPC – 24) Inventory**
 - **Support systems and coping strategies for healthy work-life balance**
 - **RAND-12**
 - **Mental and Physical composite scores (MCS and PCS) with 12 questions**
 - **Hobbies**
 - **Active**
 - **Strenuous physical activity (running, biking, gym, tennis)**
 - **Moderate physical activity (walking, golf, bowling, dancing, etc)**
 - **Light physical activity (yoga, meditation, tai chi)**
 - **Distractive (shop, read, theater/movies, listening to music/TV, unwinding with alcohol)**
 - **Creative (making music/art, cooking)**

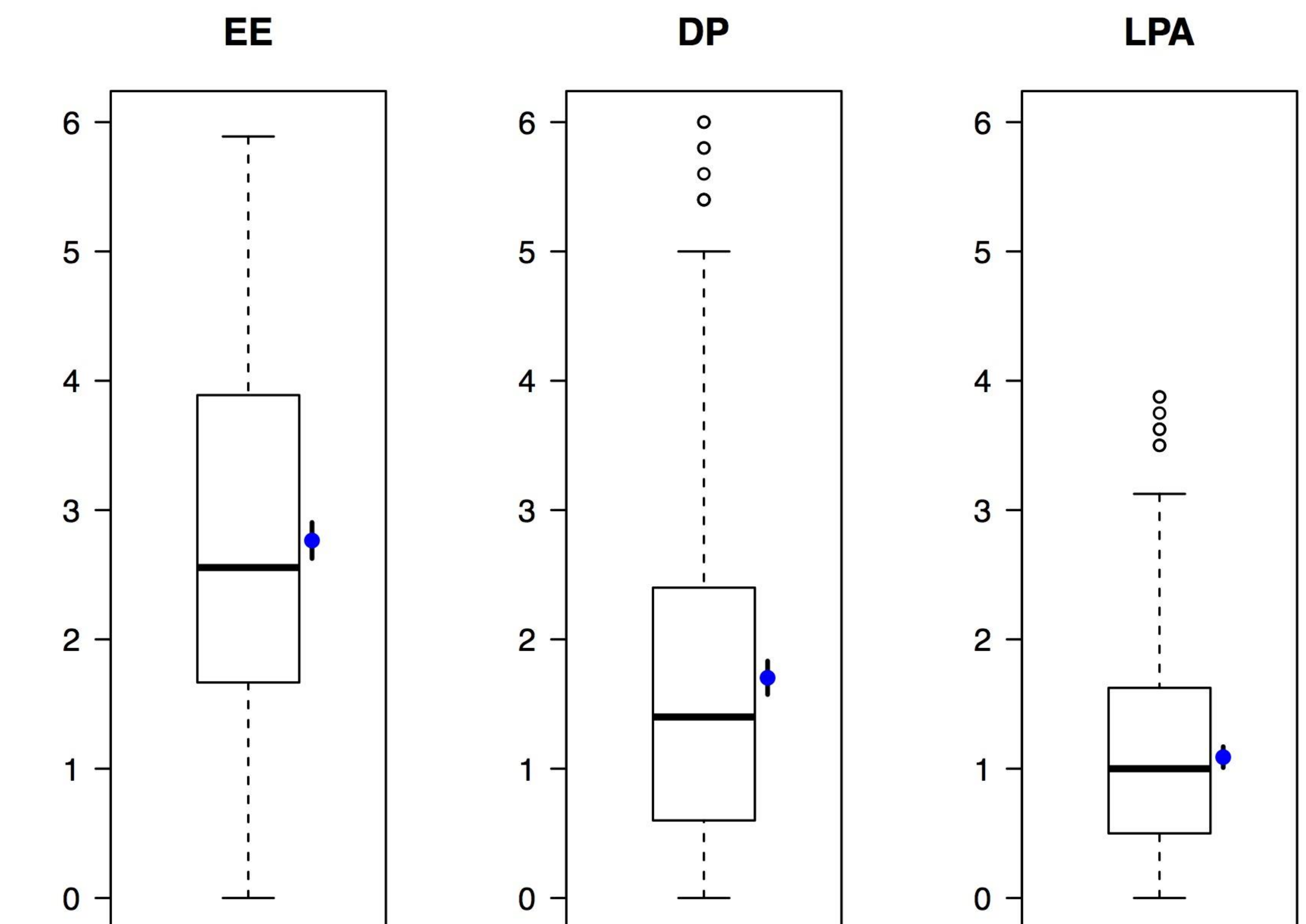
RESULTS

- Approximately 400 responses (Fairly low response rate-32.5%)
 - 71% male, 46% in teaching hospitals, and 82% attending
- **MBI-HSS**
 - **47% at least one high risk factor for burnout, 6% at risk in all three**
 - **EE and DP less and LPA the same as population values (Fig 1)**
 - **Age was associated with DP and LPA, but not EE.**
- **No association of burnout with tobacco, alcohol, or marijuana use**
- **SSPC-24 has four areas**
 - **Work satisfaction, personal support, work control, professional support**
 - **EE associated with all areas**
 - **LPA not associated with personal satisfaction**
 - **DP was not associated with any area**
 - **Respondents who feel currently burned out score lower in all areas**
- **RAND-12**
 - **MCS highly correlated with all aspects of MBI-HSS**
 - **PCS only correlates with EE and DP**
- **Little overall correlation with extracurricular activities and burnout risk**

Regression between MBI-HSS and study data

	EE	DP	LPA	BO TOTAL
AGE				
25-40	ns	<0.01	<0.01	<0.01
40-50	ns	<0.01	0.03	<0.01
50-60	ns	ns	<0.01	0.01
GENDER				
Female	ns	<0.01	ns	0.01
EDUCATION				
Resident/Fellow	ns	ns	ns	ns
SUBSTANCE USE				
Tobacco, Alcohol, Marijuana	ns	ns	ns	ns
SSPC-14				
Work satisfaction	<0.01	<0.01	0.02	<0.01
Personal support	<0.01	ns	ns	0.04
Work control	ns	ns	0.03	ns
Professional support	<0.01	ns	Ns	0.03
RAND-12				
PCS/MCS	<0.01/<0.01	ns/<0.01	0.01/<0.01	<0.01/<0.01
HOBBY				
Active	ns	ns	ns	ns
Distractive	ns	ns	<0.01	ns
Creative	ns	ns	0.05	ns

Distribution of MBI-HSS Constructs



Box and whisker plots of MBI-HSS constructs representing mean and 95% confidence intervals. Blue dots and black line are population normative quantities

CONCLUSION

- Many ASRA members have at least one risk factor for burnout
- Only 6% score high in all three compared to 15% for ASA members in general².
- We must be vigilant for the development of burnout and ensure that our people maintain adequate work-life balance.

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2. Hyman SA, Shotwell, Card EB, et al: A Survey Evaluating Burnout, Health Status, Depression, Reported Alcohol and Substance Use, and Social Support of Anesthesiologists. Anesth Analg. 2017 Oct 5. doi: 10.1213/ANE.0000000000002298. [Epub ahead of Print] PMID: 28991114.