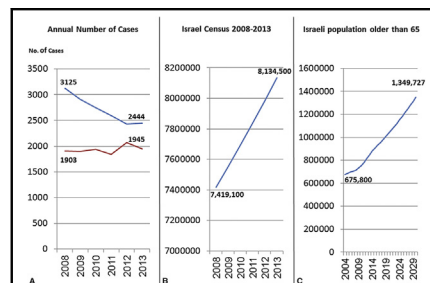


Cardiothoracic surgery training in Israel: A critical look at the past, aiming for a better future

Oz M. Shapira, MD,^a Gideon Sahar, MD,^b and Ehud Raanani, MD^c

ABSTRACT

Training the next generation of cardiothoracic surgeons is a global persistent challenge. Major issues, including length of training, decreasing volume of cases, shift toward high-risk, complex, and less-invasive procedures, increased specialization, and uncertainty with regard to future employment, are relevant and affect residency training programs in the United States, Europe, and other parts of the world. To produce high-quality, mature, and qualified surgeons, these challenges mandate an ongoing effort by our specialty leadership aimed at identifying creative solutions and adapting the current residency training curricula and methodology to the dynamic changes in our field. The current situation in Israel is discussed with the hope that sharing our experience might be useful and lead to adoption of some of our solutions by other countries. (*J Thorac Cardiovasc Surg* 2016;151:1508-15)



Changes in volume of CABG and valve operations, census, and population aged more than 65 years in Israel.

Central Message

We describe the measures implemented in Israel on multiple levels to maintain high-quality cardiothoracic surgery training.

Perspective

Training the next generation of cardiothoracic surgeons is a global challenge. The cardiothoracic surgery training program's structure, challenges, and threats in Israel are described. Ongoing initiatives are discussed with the hope that sharing our experience might be useful and lead to adoption of some of our solutions by other countries.

See Editorial Commentary page 1516.

The academic title Doctor originates from the Latin word “docere,” which means to teach.¹ Thus, the title Doctor of Medicine (MD) carries a dual responsibility—to provide our patients with the best of medical care and to ensure that the knowledge and expertise acquired over time in our field are transferred to the next generation of

physicians. For generations, surgical training was based on an apprenticeship model originating in Europe. The transition from this type of training that is undefined in time and structure to a structured systematic process is one of the most important contributions of the renowned surgeon William S. Halsted of Johns Hopkins.² John Alexander adopted many of Halsted's concepts and established the first formal thoracic surgery training program in the United States.³ Since that time, cardiothoracic surgery programs in the United States, Europe, and around the

From the ^aDepartment of Cardiothoracic Surgery, Hadassah Hebrew University Medical Center, Jerusalem, ^bDepartment of Cardiothoracic Surgery, Soroka Medical Center, Beer-Sheva, and ^cDepartment of Cardiothoracic Surgery, Sheba Medical Center, Ramat Gan, Israel.

Received for publication May 26, 2015; revisions received Nov 21, 2015; accepted for publication Jan 3, 2016; available ahead of print Feb 10, 2016.

Address for reprints: Oz M. Shapira, MD, Department of Cardiothoracic Surgery, Hadassah Hebrew University Medical Center, POB 12000, Ein-Kerem, Jerusalem, Israel 91120 (E-mail: ozshapira@hadassah.org.il).

0022-5223/\$36.00

Copyright © 2016 by The American Association for Thoracic Surgery

<http://dx.doi.org/10.1016/j.jtcvs.2016.01.017>

Scanning this QR code will take you to the article title page.



Abbreviations and Acronyms
CABG = coronary artery bypass grafting
MD = Doctor of Medicine

world have only a single common feature—they are all structured. However, the curricula vary substantially among different countries with respect to the society’s and learners’ needs, learning objectives, instructional methods (including availability and quality of lectures, clinical materials cases, case complexity, and simulation), and length of training and assessment (including and formative and summative, eg, board certification and assessment of the training program itself). Yet, training cardiothoracic surgeons has become increasingly complex and faces unique global challenges. These challenges include escalating institutional cost; declining faculty interest; expertise and dedication to education; trainees’ concerns with respect to length of training; decreasing volume of cases; shift toward high-risk, complex, and less-invasive procedures; increased specialization; and

uncertainty with regard to competence, readiness to practice, and future employment.⁴⁻⁶

Although cardiac surgery has been practiced in Israel since the late 1950s, recording of case mix and volume on a national level began only in 2008 by the Israeli Center for Disease Control, a body within the Israeli Ministry of Health. Since 2008, there has been a steady and significant decline in cardiac surgery case volume in Israel (Figure 1). For example, the absolute number of coronary artery bypass grafting (CABG) procedures decreased by 22% between 2008 and 2013 (Figure 1, A). The absolute number of valve procedures (with or without concomitant CABG) has remained relatively stable (Figure 1, A). During this time period, the Israeli population increased by 9.7% from 7.41 to 8.13 million (Figure 1, B). Thus, when measured by heart surgery procedures per million, the decline is even more pronounced, despite aging of the Israeli population (Figure 1, C). The reasons behind this substantial decline are multifactorial and beyond the scope of this article. The end result is that the clinical exposure available to cardiothoracic residents is more limited, and even more so, the number of procedures that

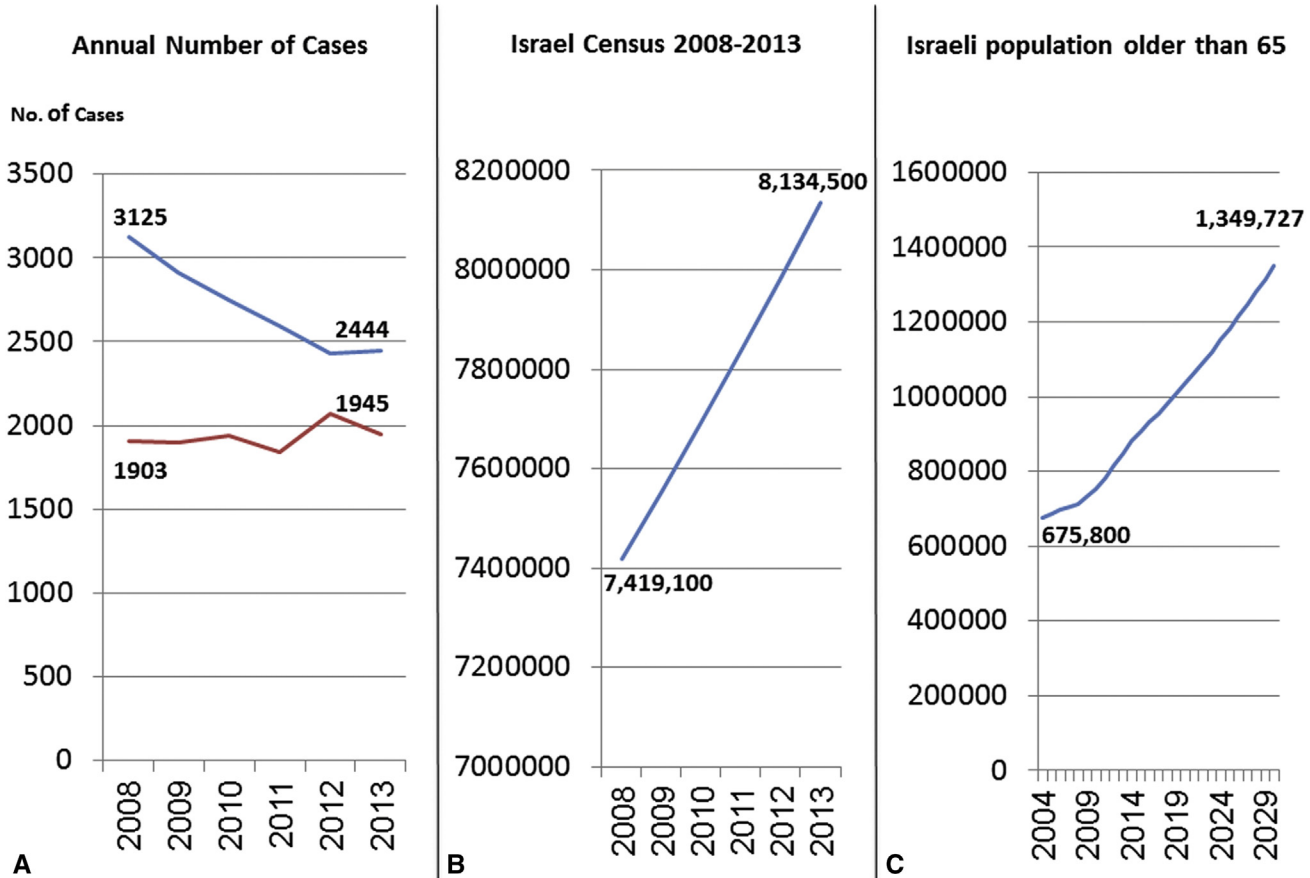


FIGURE 1. Changes in volume of CABG and valve operations (A), census (B), and population aged more than 65 years of age (C) in Israel between 2008 and 2013. Data from the Israeli Central Bureau of Statistics (<http://www.cbs.gov.il>) and the Israeli Center of Disease Control (<http://www.health.gov.il>).

Download English Version:

<https://daneshyari.com/en/article/5987734>

Download Persian Version:

<https://daneshyari.com/article/5987734>

[Daneshyari.com](https://daneshyari.com)