**Israel’s State Commission of Inquiry into the Health System and its Functioning and Future Planning for Nursing Personnel: Recommendations Versus Reality (1988-1994)**

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**Abstract**

**Background**: Medical workforce planning is critical to a country’s ability to provide adequate health care to its residents. Long-term planning must be based on sufficient, high-quality data. In Israel, the medical workforce is on the verge of a crisis despite many steps taken in recent years for long-term planning. Discussions on the need for such planning in Israel peaked in the 1990s as part of the recommendations of a State Commission of Inquiry into the healthcare system prior to the enactment of Israel’s National Health Insurance Law in 1995.

The study uses historical research methods and is based on the final reports of the Commission and other archival materials, including testimonies from nurses and healthcare experts, and interviews with experts from the Israeli Ministry of Health who were involved in decision-making.Following testimony from Israeli expert witnesses and three experts from abroad, in 1990 the Commission recommended mandatory licensing and re-licensing for all employees in the health system, the closure of two medical schools, the conversion of a dentistry school into a training center, and the adoption of solutions to increase qualified and practical nurses. It was recommended to conduct nursing training in nursing schools instead of, or in parallel with, academic settings.

 **Conclusion:** The Netanyahu Commission did not focus on the question of human resources. Its recommendations were based on the reality at the time, and on the situation in other countries. Its recommendations regarding nursing and medicine were never implemented. Instead of closing academic nursing frameworks, 10 college tracks were added. No medical schools were closed, but two were added. The enactment of the National Health Insurance Law in 1995 did not change Israel’s medical personnel shortages despite the Commission’s recommendations, and as of 2024, Israel continues to suffer a shortage of medical personnel.

**Keywords**

Health Policy, Medical staffing, National Health Insurance Law, Nursing, Academization of Nursing

**Background**

Long-term medical workforce planning is critical for ensuring that a country can provide adequate healthcare services to its citizens. Israel’s healthcare system faces a serious shortage of nurses and physicians, despite many attempts in recent years to improve long-term planning. After decades of discussions regarding health policy and medical workforce planning, a state-appointed commission of inquiry into the Israeli health system finally issued a set of recommendations, which were incorporated into a 1995 law mandating compulsory state health insurance.

State commissions of inquiry in Israel are committees chaired by a judge and appointed by government decree to examine and correct shortcomings in the wake of serious crises or catastrophes that have usually involved the loss of life or serious negligence. A slight exception to this rule was the Netanyahu Commission appointed in 1988 to examine the Israeli healthcare system. It was appointed by the government in the wake of a major economic crisis that had negatively affected Israel’s largest health insurance fund, responsible for providing health cover for most of the country’s citizens. This paper explores the reasons why two of this commission’s major recommendations regarding medical staffing planning—a vital resource—were exactly the opposite of what transpired in reality. The purpose of the article is to examine the Netanyahu Commission’s documents in the context of its discussions on medical staffing, its recommendations, and their implementation in practice.

The main issues that the Netanyahu Commission (hereinafter: “the Commission”) was tasked with considering were:

[The] functioning and efficiency of the [Israeli] health system, necessary changes in its structure and functioning, in light of the economic situation and the limitations of allocated public resources, as well as the need to maintain public medicine at a reasonable level without harming private medicine (1).

The goals of the Commission were set out in a letter from then-Prime Minister Yitzhak Shamir to the then-President of the Israeli Supreme Court, Justice Meir Shamgar (Appendix 1). The appointment of the Commission and its recommendations were the culmination of many years of attempts to enact health insurance legislation and reform the Israeli healthcare system. Indeed, the first attempts at reform came as early as 1925 under the British Mandatory government, prior to the establishment of the State of Israel in 1948. The last attempt prior to the establishment of the Commission came in 1978. Thus, for example, in a 1958 report published following the eighth set of discussions on healthcare reform, no reference was made to the issue of medical workforce planning. Regarding nursing, only a single line notes that: “nursing services will be professionally and administratively unified in one regional department” (2). The next section, dealing with social work, is longer. A reading of the report suggests that nurses were not involved in the drafting of these recommendations.

The political circumstances in Israel in 1990 brought the government to a crossroads and enabled it to finally implement its long-term vision for mandatory health insurance legislation. The Commission also recommended reducing the number of medical schools in Israel and increasing the number of practical nurses, in light of a re-examination of the global direction of travel towards the academization of nursing. This article examines the roots of these recommendations, which include expert testimonies given to the Commission, the extent to which its recommendations were actually implemented, and their impact on the reality of medical staffing in Israel some 30 years after they were made.

A review of the literature about the Commission with regard to the State Health Insurance Law that came into effect on 1 January 1995 (3) in the wake of its recommendations, shows that it mainly focused on three key topics. These were: separating health insurance services from regulations, providing an equal “basket” of health services for all residents of Israel, and shifting responsibility for collecting health insurance from the country’s health maintenance organizations (HMOs, or sick funds, as they are called in Israel) to the Israeli National Insurance Institute according to a uniform capitation formula. Other topics raised alongside these main discussions, according to conversations between this author and Professor Yitzhak Berlowitz (a former deputy director of the Israeli Ministry of Health) in January and March 2023, included the provision of private medical services, preventative medicine, quality assurance, and medical personnel management (4). This article examines the Commission’s discussions around nursing, including by reviewing statements of the nurses who were summoned to testify before the Commission and the Commission’s recommendations regarding nursing.

***Methods***

The article uses the historical research method. As is customary, emphasis was given to primary sources. Archival files containing the transcripts of testimonies given to the Commission were reviewed, in particular those of nurses. Interview with contemporary health policy leaders was well as relevant reports by Israel’s State Comptroller and additional archival material were also reviewed. To examine secondary sources, books and databases were searched for references to the Commission, the Israeli State Health Insurance Law, and medical and nursing personnel in Israel. The searches were undertaken in Pubmed (<https://pubmed.ncbi.nlm.nih.gov/>) and the Cumulative Index to Nursing and Allied Health Literature database (CINAHL).

The article begins with a background and moves on to a methods section and historical background. The discussion then examines the testimonies given to the Commission and its subsequent recommendations compared to what actually transpired regarding the nursing profession after its recommendations were made, in line with the research questions. The conclusions section examines the extent to which the recommendations regarding staffing planning meet current needs.

***Research questions***

The research questions are as follows:

*1. What were the recommendations of the Commission regarding staffing planning for the nursing workforce?*

*2. What data did the Commission have at its disposal, and on what were its recommendations based?*

*3. To what extent is there congruence between the Commission’s recommendations and what has actually transpired in the 30 years since they were made?*

**The state of nursing in Israel, 1948–1988**

After Israel declared its independence in 1948, nursing schools providing three-year training courses were opened in all the country’s hospitals. An army-run nursing school was also opened in Tel HaShomer Hospital in the Tel Aviv district in response to a severe shortage of human resources. Caregivers were trained by women’s organizations and operated under license of the Israeli Ministry of Health. The number of practical nurses was particularly high.

A census of nurses conducted in 1948 showed that, during the years of the British Mandate (1917–1948), some 1,335 certified nurses had been trained in the Jewish settlement in Mandatory Palestine. In comparison, during the seven years after Israel declared its independence in 1948, 1,428 nurses graduated. Practical nurses performed similar roles to registered nurses (5). Nurit Ben Dov, Israel’s Chief Nurse, who testified before the Commission, supplied data on nursing staff from this period (6). Israel had suffered from a lack of nursing staff since 1948, initially as a result of the large-scale immigration of Jews (7) to the new state, which had necessitated the opening of many new healthcare services (hospitals, clinics in new settlements, and mother-and-baby clinics in every settlement and neighborhood).

Ben Dov told the Commission that nursing in Israel was facing the same problems and trends as elsewhere in the world. Most countries had a notable shortage of nurses and nursing auxiliary staff and had adopted similar solutions—improved professional status, financial reward, competition with other professions, and changes in training for nurses. Ben Dov set out the main issues facing nursing in Israel:

Compared to Europe, Israel is at a peak in the ratio of physicians per head of population, while it has a very low ratio of nurses per head of population. This phenomenon has consequences for the nature of the duties assigned to nurses, the supremacy of physicians within the team, and the degree of professional autonomy, status, and remuneration (6).

Ben Dov went on to list previous committees that had tried to tackle the issue of policymaking in nursing—the Tel Hashomer Forum (1978), the Ben Dov Committee (1979); the Shafi’im Forum (1983); the Avia Forum (1984); the Kiryat Anavim Forum (1987); the Shoresh Forum (1988); the team for overall personnel planning in the health system (1988), in addition to the regular meetings at the Ministry of Health.

According to a census of nurses included with Ben Dov’s testimony, in 1972, there were 16,875 practical and certified nurses in Israel compared to 26,905 in 1984. Data from the Israeli Central Bureau of Statistics showed that in 1984 some 1,500 nurses held academic degrees and that 95% of nurses were female with about half working in part-time roles. In December 1988, there were approximately 31,000 registered nurses in Israel, of whom 16,250 were licensed. Calculating the proportion of those with academic degrees out of the total number of nurses revealed that in the General Health Fund (Clalit), they amounted to 4.9% of all nurses in 1988, while the Ministry of Health had no data. The percentages of certified nurses (working for Clalit) are shown in Table 1 below (6):

**Table 1: Percentages of Certified Nurses in Israel (1988)**

|  |  |  |
| --- | --- | --- |
| **Workplace** | **Ministry of Health (Jun. 1988) (%)** | **Clalit (Dec. 1987) (%)** |
| General hospital | 58.5 | 59.4 |
| Community services | 69.4 | 58.4 |
| Mental health | 30.2 | 45.0 |

According to Niral and Paryente (8) the shortages of health workers and nurses in Israel’s early years had been temporarily alleviated in the late 1980s, mainly because of the influx of qualified nurses during the largescale immigration of Jews from the former Soviet Union. The data show that in 1989, 87 percent (or around 8,000) of all nurses granted a license to practice in Israel had immigrated from the former Soviet Union. A year later, in 1990, some 16 percent of all nurses in Israel were immigrants. Upward of 80 percent of these were employed as practical nurses pending receipt of a license to practice. In effect, the nursing shortage was alleviated mainly because of an increase the number of practical nurses. Over a short period, the proportion of practical nurses in Israel jumped from around a third of the overall nursing workforce to just over a half (53 percent). This ratio was to fall continually until 1995, when the State Health Insurance Law entered into force (5). The Soviet immigration therefore relieved the nursing shortage for a short period, and resulted in the closing of training courses for practical nurses in Israeli high schools, amid an attempt to shift nursing training to the universities. This move came some years after Israel’s first academic nursing department opened in Tel Aviv University in 1968. Studies have shown that this development led to an improvement in the stability of the nursing workforce, its level of education, and the retention of nurses in the profession (9). The Soviet immigration also temporarily alleviated Israel’s physician shortage.

***Debates over the direction of nursing***

According to unpublished research by this author, during the 1980s, a heated debate had begun in various countries regarding the direction in which nursing should develop. In the United States for example, there were disagreements over whether academically-qualified nurses were more effective than practical nurses, and whether they ought to be granted more powers. In general, nurses supported academization as a way to develop their profession, while economists and physicians opposed it. In a guest editorial in a leading American nursing journal in 1987, for example, the renowned American economist and healthcare labor expert Prof. Eli Ginzberg argued that there was no proof that academically-qualified nurses were of more benefit to the healthcare system than practical nurses (10). The Netanyahu Commission invited Ginzberg to testify on this matter—and, fatefully, adopted his position in its recommendations.

***Assessing medical staffing needs in Israel at the time of the Commission***

In order to formulate its recommendations, the Netanyahu Commission needed data on personnel. However, at the time, there was no centralized data available. Indeed, Israel’s State Comptroller emphasized this deficiency in various reports on the Ministry of Health. also

The State Comptroller blamed the problems of the healthcare system on the lack of a medical staffing planning system in the Israeli Ministry of Health (11). In the following years, the State Comptroller would return to this issue and make similar criticisms. A 2003 State Comptroller’s report noted that nurses were the largest sector in the healthcare system—in 2001 there were 51,000 nurses in Israel compared to 45,000 in 1997. The same report also noted that nursing had changed in this period, in that the proportion of nurses with an academic degree had increased year-on-year while the number of practical nurses had remained constant, and thus their proportion within the overall workforce had shrunk. The State Comptroller noted that, in 1990, the Netanyahu Commission had recommended examining the trend toward academization in nursing in light of the costs involved and of doubts regarding its impact on the supply of nursing staff required by the Israeli healthcare system. The State Comptroller noted that, in the wake of the Commission’s recommendations, there had been several attempts to address the issue of academization but only in 2002 was a committee finally established to examine the benefits of academically qualified versus practical nursing staff in light of the recommendations of the Netanyahu Commission (12).

The importance of academization in nursing is evidenced by many studies undertaken in the years that followed Israel’s healthcare reforms, the Commission’s recommendations, and the entry into force of the State Health Insurance Law in 1995. In a 2014 paper, Aiken and McHugh reported that in Israel, in line with trends worldwide, chronic morbidity was on the rise as a result of the aging population, and in this context, nurses were the mainstay of the healthcare system (13).

In his 2003 report, Israel’s State Comptroller recommended that the government:

Act proactively to create a legal infrastructure that will enable a database and establish a clear policy such as establishing standards for physicians and formulating policy regarding change in the composition of the nursing workforce (11).

It seems, therefore, that in this period, the topic of nursing staff, its scope, and level of training/education was treated in a marginal and intuitive way, in the absence of any database of nursing personnel or multiyear forecast. As of 2024, Israel still does not have any official database with data of nurses holding advanced degrees.

***The establishment of the Commission***

Seventy years would pass since Israel’s first health insurance initiative, and 15 state health insurance bills would be submitted to Israel’s parliament, before the conditions were finally ripe for the appointment of a state commission of inquiry to reform the country’s health services in 1988 (14). On June 14, 1988, the Israeli government appointed the Netanyahu Commission, and limited its mandate according to its need to focus on:

Firstly, the economic situation of the country and the limitations of the public resources that can be allocated for this purpose. Secondly, the need to maintain public medical services at a reasonable level for all, and thirdly, without harming the possibility of receiving health services for private consumption. (1)

 The issue of staffing was not mentioned in the appointment of the Commission.

Former Israel Supreme Court Justice Shoshana Netanyahu was appointed as chair of the Commission, while its remaining members were selected on a personal basis, and not as representatives of medical institutions or professions. Its five members included two hospital administrators, one from a state hospital (Tel HaShomer) and one from a private hospital (Hadassah), and two university professors. The Commission had no representative from Clalit, the largest body in the Israeli healthcare system, or from Israel’s largest trade union (the Histadrut), the Medical Histadrut, or the Israeli Nurses’ Association. Not a single nurse was appointed to the Commission, even though nursing was the largest sector in the Israeli healthcare system. The only woman on the Commission was its chair, Justice Netanyahu.

***Testimony before the Commission***

The Commission published notices in the press, inviting inquiries from the public. Eventually, it would discuss 211 such inquiries. The Commission also heard testimony from 148 witnesses, some of whom it invited, while others had requested to testify, and held consultations with three well-known experts from abroad. The total recorded evidence gathered by the Commission amounted to 11,272 pages. In addition, those gathering material for the Commission interviewed 63 people who asked to testify before it. The Commission was also assisted in its work by extensive professional literature from Israel and other countries (15).

*Ty from nurses*

The following senior nurses were asked to testify before the Commission: Israeli head nurse Nurit Ben Dov, Nitza Bauman, head nurse at Clalit, Malka Grebler, secretary of the Nurses’ Association, Ilana Cohen, head of the hospital nurses’ division of the Israeli Nursing Association, Lea Coren, a district nurse at Clalit, Yael Davidson, supervisor of public health services at the Ministry of Health, and Ziva Tal, head nurse at Tel HaShomer Hospital.

Nurses Ziva Tal and Nitza Bauman, who testified before the Commission, both worked with Israel’s Chief Nurse Nurit Ben Dov on the Council for Higher Education’s Planning and Budgetary Committee in its discussions on the academization of nursing. Their recommendations are cited in the Commission’s majority and minority opinions. Those who were not members of the committee were heads of nursing departments at various universities, such as Prof. Rebecca Bergman, the first nurse in Israel to be awarded a doctoral degree. Representatives from Clalit and the Ministry of Health (including the ministry’s general director Prof. Dan Michaeli) and university deans, were among the members of the Planning and Budgetary Committee. Its chair, Prof. Harari, opened the discussion by noting that the academization of nursing had developed considerably, and that it was time to pause and take stock. At the time, three Israeli universities were already providing academic training for nurses—Tel Aviv University, the Hebrew University of Jerusalem, and Ben-Gurion University in Beersheba. Five years previously, an agreement was reached between the Ministry of Health and authorized bodies in the healthcare system that nurses should be academically trained. The universities agreed to this request on the condition that it be implemented gradually, so as to avoid affecting standards or burdening higher education budgets, and so that academic principles could be maintained (16).

Prof. Harari, who led the discussion on behalf of the Council for Higher Education, stated that he “almost did not understand” the unanimity in the healthcare system in favor of academizing nursing, adding that:

We supported it, and we will continue to support it, but I would like to understand where academization could harm the healthcare system, and what about the objections that nurses with an academic degree perform less well at the patient’s bedside? (16).

 The Planning and Budgetary Committee noted that the academization of nursing was a trend in several countries as well as Israel and discussed whether academic nurses were the future of Israeli nursing, including in view of studies indicating that academic nurses performed better. The director general of the Ministry of Health and the university deans supported academization.

 Many of the nurses who testified before the Netanyahu Commission were not asked directly about the trend toward academization. Those who did address this topic, likely on their own initiative, were also members of the Planning and Budgetary Committee. Indeed, Ziva Tal had pointed out to the Planning and Budgetary Committee that at Tel HaShomer hospital, most academic nurses worked in primary care and contributed to the advancement of medicine (16). In her testimony to the Commission, Tal reported that the introduction of new medical technologies over the past decades had prompted changes in nursing practice, and that “nurses who had traditionally taken care of basic needs found themselves involved in sophisticated medical care.” Patients’ needs had changed and nurses had to change in response. Tal advised expanding nurses’ powers and increasing the number of nurses included in policymaking, involving nurses in decision-making and defining the balance of power and authority in allocating resources, that is, giving senior nurses managerial powers. However, in the summary of her testimony and in her memorandum, both of which are presented on Tel HaShomer Hospital letterhead, the word “academic” does not appear (17).

 Nurse Bauman told the Planning and Budgetary Committee that in the future, all nurses would be academically qualified. She also noted that some 60 percent of nurses continued on to higher education after completing their studies, and those who enrolled in nursing schools preferred to study in an academic school. Around 500 students were enrolled in Israel’s four academic nursing schools compared to just 1,000 across all 12 regular nursing schools. The dropout rate in academic nursing schools was lower than in regular schools—20 percent versus 30 percent) (18). In her extensive testimony to the Commission, Bauman spoke mainly about the role of the nursing director in hospitals and in Clalit in general, and said nurses should be granted budgetary autonomy and the director of nursing given the proper tools to help her work in partnership with management. Only on the penultimate page of the written summary of her testimony is the question of academization mentioned:

Why do we in nursing always have to convince [others] of the necessity of such a function in academic studies and the contribution of the nursing director if she is a member of the management team, and not in a sectoral way, but as a member of management (18).

 In addition to her testimony, Bauman also submitted a memorandum to the Commission with background data on nursing and the health professions (the Commission stated that in most cases this was based on data from Clalit, given the lack of a national database).

 Other nurses also testified to the Commission. Chief Nurse Ben Dov said that nurses’ clinical expertise should be developed and a primary care model implemented, and reiterated the need to increase nurses’ autonomy. Ilana Cohen referred in passing to nurses’ autonomy (19, 20).

 A table included in the 2022 report of a Medical Staffing Committee chaired by Prof. Ronni Gamzu shows the goals formulated by each of the committees mentioned above, and the nursing shortfalls in 2022, despite all the recommendations and plans (21).

*Testimony from non-Israeli experts*

The Netanyahu Commission invited three experts from abroad—Prof. Eli Ginzberg, Prof. Robert J. Maxwell, and a third individual who is not named in the Commission’s reports. Only the recommendations of Ginzberg—a prominent American Jewish economist and expert on healthcare labor—are noted in the final reports.

 *Professor Eli Ginzberg*

Beyond his expertise as a health economist, Ginzberg (1911–2002) played a unique role in the development of Israel’s healthcare system. A professor of economics at Columbia University, Ginzberg focused on labor and healthcare in his research. He had specialized in health during the Second World War. The son of Rabbi Louis and Adele Ginzberg, Eli was born in New York. He was appointed professor of economics at Columbia in 1935, where he would teach for more than six decades. After the Second World War, he was appointed by President Harry Truman to represent the United States at the May 1946 conference on Nazi victims who could not be repatriated. He would also advise General Eisenhower, who became president of Columbia University in 1948 (22). Ginzberg continued to advise various U.S. states and was a well-known and influential personality in health economics and labor in the healthcare system. Over his lifetime, he advised eight United States presidents on these issues. He published numerous books and papers on various topics, including nurse practitioner provision and managed care.

 Ginzberg’s father, Louis, was a highly influential rabbi and an academic, whose life also intersected with the development of Israel’s healthcare system. Born in Lithuania in 1873, he became known as a Talmud scholar, but after a short period of study at a Jewish seminary, left to study at universities in Berlin and Strasbourg, where he gained his doctorate at just 25. Louis later immigrated to the United States, where he was involved in the leadership of the Conservative Judaism movement, teaching at the Jewish Theological Seminary of America. He was also a member of the Board of Trustees for the Hebrew University of Jerusalem (23). Among Louis’ students was Henrietta Szold, an American Zionist leader whose family were close friends with the Ginzbergs. The relationship between Louis and Szold grew closer and was described as an “exceptional friendship” (24) such that Szold was expecting a marriage proposal. Her dream was dashed when Louis announced his engagement to Adele Katzenstein—a blow that ultimately spurred Szold to found the Hadassah Women’s Zionist Organization of America and establish the Hadassah School for Nurses in British Mandatory Palestine. In thus doing, Szold laid the foundation for nursing training in Israel, and pushed for the academization of nursing from the very beginning of the Hadassah school’s existence (25).

 Eli’s mother Adele was born in Germany in 1886 and moved to Berlin at the age of eight after the death of her mother. After receiving a basic education, she wanted to study nursing, but could not do so. She married Louis Ginzberg in 1909, and moved to New York. There they had two children, Sophie (Ginzberg) Gould and Eli Ginzberg (26). Eli married Ruth Szold, who was also active in the Hadassah organization (Ruth was a distant cousin of Henrietta’s).

***Ginzberg’s work on nursing development in the United States***

A search of nursing journals in the United States reveals dozens of articles written by Ginzberg, as sole or joint author, about the changes taking place in nursing in that country. In a piece written as senior guest editor in the Journal of Nursing Administration in 1987, Ginzberg discussed developments in nursing in the 1980s, the same period that the Netanyahu Commission considered. Comparing the situation in 1980 to that in 1987, he noted that, in retrospect, the issues with the nursing profession had stemmed from the complexity of treatment in hospitals versus the need for skilled nurses in the community, and the growing number of nurses leaving the profession for other jobs amid a fall in the number of nursing posts. Against this, Ginzberg also reported a rise in the number of qualified nurses in relation to the number of hospital patients, while salaries remained stable, with the exception of compensation based on academic and performance levels. Nursing in the United States was experiencing a period of stability, and opinions differed regarding the need for academic nurses. Ginzberg argued that a more in-depth analysis of the profession was required, since many of the issues that had long preoccupied nursing leaders and policy analysts had not been resolved, even though the economy and healthcare sector demanded a rapid response. There is no hint in the literature of the relationship between education, value, and the irrational salary conditions that resulted from the range of two to five or even six years of professional training, and neither were any significant differences in productivity found, which subsequently made salary levels arbitrary and unjustified. Referring to the future, Ginzberg reemphasized the need to examine this issue (10).

***The impact of Ginzberg’s testimony on the Commission’s recommendations***

In light of Ginzberg’s testimony and advice, it is not surprising that the Netanyahu Commission made the recommendations it did regarding nursing training and academization. When Ginzberg traveled to Israel to testify before the Netanyahu Commission, he was taken on tours of hospitals, universities, and HMOs by Prof. Pinchas from Hadassah Hospital, and Prof. Shani from Tel HaShomer Hospital. Ginzberg would describe his visit to Israel, which included tours of two HMOs as well as universities and medical centers in Beersheba, Jerusalem, and the Galilee region, in a 1999 paper in the Journal of Urban Health. He described his meeting with Gabi Ben-Nun, then-vice director of Finance and Health Insurance at the Israeli Ministry of Health (27). Ginzberg does not mention meeting any nurses during his trip, although it is likely that he would have encountered them in the hospitals he visited. His paper focused on expected changes in various aspects of the State Health Insurance law and made comparisons between Israel and the United States. With regard to staffing issues, Ginzberg referred only to the relatively high number of physicians in Israel—300 per 100,000 head of population in Israel compared with fewer than 270 per 100,000 in the United States. He noted that graduates of all four of Israel’s medical schools were guaranteed work. Israel had also permitted most Soviet immigrant physicians and Israeli graduates of foreign medical schools to practice. Ginzberg further noted that Israel allocated 8 percent of its gross national product to healthcare, compared with 14 percent in the United States. When he returned to New York, Ginzberg sent the Commission a four-page document with his recommendations. With regard to staffing planning, he advised slashing the number of places at medical and dental schools. Regarding nursing, he wrote that “the option for nursing training of two to two-and-a-half years post high school should be expanded” (28).

 The curriculum vitae of a second expert, Robert Maxwell, a British health policy expert and honorary fellow of the Royal College of Physicians, is also in the Commission’s files. However, neither his testimony nor any quote from his recommendations were included in the Commission’s reports.

***The Commission’s final report***

The Commission filed its final report on August 20, 1990 (1). It included a detailed review of the Israeli healthcare system and 116 recommendations for reform. Of these, 82 were a majority opinion. The most important of these was the recommendation to enact a state health insurance law. Other recommendations included that the Ministry of Health cease to act as a direct provider of health services to individuals, that public hospitals be managed by corporations, and other proposals regarding the provision of regional health services. One Commission member, Prof. Arie Shirom, did not agree with the majority opinion and filed his own detailed minority opinion (29, 30).

*Nursing and medical staffing recommendations*

The Commission dedicated an entire chapter of its majority opinion to the question of medical staffing, of which fewer than four pages were devoted to nursing, including tables and figures with data. The opening of the chapter notes that the aim of staffing forecasting and planning was to estimate staffing numbers and the level of training required to achieve goals and objectives, adding that “proper planning may prevent duplication, solve problems of shortages or excess, and thus contribute to employee satisfaction,” and noting that:

This is a difficult task, and in most cases certain assumptions underlying staffing forecasting are not realized, but nevertheless it is impossible not to act on this important issue—however, the changing data must constantly be monitored while this action is being taken (1).

 Similar remarks were made in the minority opinion. The majority and minority opinions were based on testimonies by two senior nurses, Ziva Tal (17) and Nitza Bauman (18) who are mentioned prominently in both and are cited as having supported increasing the numbers of academically-qualified nurses. A further report edited by Dr. Leah Tzivoni was also cited in reference to the question of academization (16).

 Both the Commission’s majority and minority opinions cite testimony from Ginzberg. Ginzberg testified to the Commission that only a limited number of around 30 percent of academically-qualified nurses was required, while the remainder of nurses should have two years of training and a high school education (1). The minority opinion expanded on this, noting that Ginzberg had told the Commission that, in the United States, 60 percent of nurses had just two years of training (practical nurses), while only 30 percent applied for academic training (29). In his oral testimony and in a separate written opinion to the Commission, Ginzberg recommended that Israel aim for a similar mix. In Ginzberg’s opinion, the need for highly-educated nurses was limited. Most had a low level of education, which is the basis on which he supported the idea of two-year nursing training programs for high school graduates (28).

A similar position was expressed by Professor Arie Durst, a senior physician at the Hadassah Hospital and the Hebrew University of Jerusalem. Durst argued that the academization of nursing and the transition to a four-year nursing training program resulted in large shortages, mainly of theater nurses, but also of ward staff. He proposed limiting nursing studies to the earlier model of three years training at a nursing school, with an option to extend for another academic year. Training for practical nurses should be limited to 18 months. Durst also recommended training medical technicians and theater technicians, as was the norm in other countries.

Both the Commission’s minority and majority opinions cited recommendations made in 1985 by the Ministry of Education-appointed Council for Higher Education’s Planning and Budgeting Committee, whose role is to allocate budgets to academic institutions. These recommendations included diverse opinions by physicians, academics, and senior nurses, all of whom supported the academization of nursing.

*Trends in nursing staffing patterns*

The lack of an up-to-date personnel database meant the Netanyahu Commission had to rely on data from Clalit, as well as various reports by the Israeli Bureau of Statistics and the Israeli State Comptroller. From these reports, the Commission was given to understand that Israel had a growing shortage of nurses. In particular, what stood out was the drop in the proportion of practical nurses, and the concurrent rise in the proportion of academic nurses in the overall nursing workforce—in contrast to the increase in the age and scope of the population, and in particular in specific professions such as geriatric medicine. The majority opinion also noted the growing trend of part-time working among nurses, especially hospital nurses.

According to the Commission’s majority opinion, the predicted trends that should be taken into account in staffing planning included: a rise in new medical technologies that would require nurses to acquire particular skills, a shift to community care and day hospitalization, and a greater emphasis on preventative medicine and health education that would require nurses to have in-depth and extensive training. The same was true for the care of older people with disabilities. At the same time, the Commission found no data to predict the needs that would arise as a result of these trends, so it was difficult to estimate staffing needs and scope.

Ostensibly, there seems to be a contradiction between the Commission’s recommendation to increase the number of practical nurses in the workforce and its final recommendation to expand and deepen nursing training in line with the above-noted trends. This final recommendation would be realized several years later, after the enaction of the State Health Insurance Law in 1995. The Commission’s minority opinion mentions another issue: most nurses were employed in hospitals where staff management and work schedules and assignments were the responsibility of qualified, academic nurses, who therefore needed management training. In this context, it is interesting to note that, in 2015, training courses in nursing administration and policy were provided for the first time in Israel, and as of 2024, undergraduate and graduate degrees in healthcare administration are now offered in several Israeli universities and academic colleges.

*Nursing duties and responsibilities*

The Commission’s minority opinion recommended reexamining how nursing duties were organized across all hospital settings. This included creating staff positions, examining optimal inpatient ward sizes, increasing flexibility in the use of human resources, providing staff mobility and rotation with adequate compensation, developing promotion pathways, and creating special training pathways for nurses and auxiliaries in specialisms where there were clear staff shortages, including geriatric medicine. The minority opinion also recommended offering shorter nursing training courses in high schools and trade schools. Its two other recommendations were to establish a proper mix between academic, qualified, and practical nurses in the Ministry of Health, according to which a nursing training policy could be developed, and to advance the adoption of regulations for nursing that would define licensing processes and required levels of training and education. It is worth noting that in Israel, the licensing of nurses continues to be governed by regulations put in place in 2012, when a draft Nursing Bill was submitted to Israel’s parliament (Knesset) in 2012 by Knesset member Aryeh Eldar, a physician by profession. The bill has yet to be put to the vote.

*Nurses and health policy decision-making*

With regard to the involvement of nurses in decision-making and health policy, a biography of Prof. Mordechai Shani (31), mentions a 1988 memorandum from Shani to the then-Minister of Health. Among those recommended to the Commission were three nurses—Tzvia Vin from the Ministry of Health, and Nima Amit and Dalia Baruch, both hospital nurses. This memorandum, as well as a proposed health insurance law Shani drafted in 1978, were “buried among other papers” until a window of opportunity to enact such a law arose in 1994 as part of work around the State Health Insurance Law. According to conversations between this author and Professor Yitzhak Berlowitz (a former deputy director of the Israeli Ministry of Health) in January and March 2023, Shani believed that both documents were reflected in the Netanyahu Commission’s recommendations. However, Shani’s biography does not mention the issue of staffing planning, which rather indicates its marginality amid all the reforms Shani proposed.

Immediately after the State Health Insurance Law entered into force in January 1995, Shani began implementing the Commission’s recommendations. In a conversation with this author in May 2024, Prof. Gabi Ben-Nun (a former deputy director of the Israeli Ministry of Health) noted that in all the committees he chaired and in discussions regarding the shortage of nursing personnel in the Ministry of Health, the starting assumption was that the nurses would be academics. two committees were formed to discuss the academization of nursing. Later, Shani would predict that:

Within a generation, there will be a tremendous change in global health services. Within twenty years we will have smart machines…the whole world of sensors is pointing us in this direction (32).

***Next steps in the academization of nursing in Israel***

In 2004, in the wake of the Commission’s recommendations, another committee was appointed under the leadership of Prof. Yitzhak Berlowitz. It mainly addressed the further development and academization of the nursing profession, the ending of practical nursing training, and the development of a role for skilled nursing auxiliaries. Three years later in 2007, yet another committee was appointed, chaired by Ben-Nun, then the deputy director of the Israeli Ministry of Health, which also recommended expanding the existing nursing training system by adding 850 academic places and increasing budgets accordingly. In 2010, a further committee recommended expanding existing academic training, opening new courses, and developing a nursing conversion course for graduates in other disciplines. The Horev committee asked that a target of 2,300 nursing students should be trained each year, with the aim of reaching a rate of 5.8 nurses per 1,000 head of population by 2025. Indeed, in 2016–2020, there was an increase in the number of academic places on nursing courses in universities and colleges, and in the number of students enrolled on academic nursing training programs in nursing schools across Israel. From 2021, graduate programs in nursing were offered at five universities and eight academic colleges. Nursing conversion courses for graduates in other disciplines were offered at 15 universities and colleges. This completed the transition to academization, and as of 2024, all nursing courses in Israel are conducted in universities or academic colleges (21). Trained nursing auxiliary and physician assistant roles have also been developed.

***The current situation: nursing shortages***

There was a reversal of trends in the years that followed the Commission’s recommendations. Two new committees were appointed to consider the issue of the academization of nursing—one chaired by Ben-Nun and another by Berlowitz, then both deputy directors of the Ministry of Health. Both recommended establishing an Academy of Nursing Studies—a suggestion that was indeed implemented. By 2017, the transition to academization was complete, and all training courses for nurses had become degree programs at universities or academic colleges.

 However, Israel’s nursing shortage has grown worse, as is apparent from the report of a Medical Staffing Committee chaired by Prof. Ronni Gamzu, which was appointed in 2022 by Prof. Nachman Ash, director general of the Israeli Ministry of Health. According to that report, the trends that had affected the Israeli healthcare system in recent years—including the aging population, rises in chronic illnesses, increased demand for healthcare services, an accelerated transition to home care, and advances in medical technologies—require an increase in nursing staff through more training programs and improved professional competence. In 2021, there were 79,936 licensed nurses in Israel, or 5.84 nurses per 1,000 head of population (21). This is low compared to the Organization for Economic Co-operation and Development (OECD) average. In 2021, a medical staffing report by the Israeli Ministry of Health showed that the number of working nurses had fallen to 5.1 per 1,000 of population in 2020, compared to an OECD average of 9.7 (33)

In the year following the coronavirus pandemic, demand for places on nursing degree programs in Israel increased, and the number of new nursing licenses to practice also rose. In 2021, 3,572 people enrolled in nursing courses in Israel, compared to just 979 in 2010. The Gamzu Committee recommended a target of seven nurses per 1,000 head of population, and advised increasing capacity in the higher education system to provide more academic places for nurses (34).

***Summarizing the Commission’s main recommendations***

In summary, the Commission’s most important recommendation concerned restructuring Israel’s Ministry of Health to address policy and regulatory issues. This included creating several new divisions at the Ministry, including a human resources directorate that would tackle medical staffing planning.The proposed human resources directorate would be tasked with developing an up-to-date database of healthcare professionals, collating information regarding staffing requirements, demands, and implementations with a view to forecasting staff supply and demand, and undertaking work to match staff supply with demand. It was also recommended that licensing and relicensing would be mandatory for all healthcare professionals. It further called for the conversion of two medical schools and one dentistry school into a training and continuing education center, and for limiting the number of specialist institutions. Due to the complexity of this issue, the Commission did not make clear recommendations. In relation to nursing, the Commission stated that solutions should be sought to discourage registered and practical nurses from leaving the profession, and to encourage those who had left to return. It recommended creating training courses for nurses, including in vocational high schools, increasing the retirement age, and encouraging part-time working. It is clear that these are only medium-term recommendations. Only later were recommendations made by the Commission to strengthen the autonomy of qualified primary care nurses, develop avenues for promotion, and grant expanded powers to nurses to encourage direct patient care. However, immediately following this written recommendation, the Commission wrote another recommendation that technical auxiliary staff should be trained as an alternative to nurses.

 Finally, the Commission recommended that training programs in nursing schools be examined in comparison with or in addition to academic training at universities. It is hard to find any long-term planning in these recommendations, other than the advice to reduce the number of nurses with post-basic training and to train auxiliary staff.

The Commission’s minority opinion determined that the lack of efficiency in Israel’s healthcare system was related to the large number of physicians, and recommended closing a medical school and reducing the number of physicians joining the healthcare system. The minority opinion briefly notes that existing and predicted nursing shortages required immediate planning. Chapter 7 of the minority opinion, which discusses staffing planning and training, cites the recommendations of the Tzivioni Committee and the Nursing Committees regarding increasing the number of academic nurses as a way of raising the level of the profession and tackling technological demands. However, the minority opinion also cites Ginzburg’s testimony, which said that only a limited number—30 percent—of academically-qualified nurses were needed. The minority opinion also relies on the testimonies given by nurses with regard to the involvement of nurses in management). There is no doubt that the minority opinion adopted the positions of senior nurses Ben Dov, Tal, and Bauman regarding increased autonomy for nurses.

***Impact of the Committee’s recommendations***

The discrepancies between the Commission’s recommendations and the reality on the ground in 2022, as noted in the Gamzu Committee report, brings us back to the research questions:

1. *As described above, the core recommendations document does not address the issue of staffing.*This isbecause of the objectives set for the Commission and the lack of data on existing staff. Instead, the Commission relied on data from Clalit provided by the Chief Nurse. As Bauman testified, Clalit operated only five nursing schools at the time. The Commission’s main recommendation regarding staffing planning was to create a human resources directorate within the Ministry of Health. The nurses who testified before the Commission had supported increasing the status of nurses on the job, granting them additional powers, and increasing their involvement in management. However, these nurses paid less attention to the question of nursing training. This is perhaps because they were also involved in the Planning and Budgetary Committee, which was focused on academization and had agreed that this was the right direction of travel for Israel.

2. *Congruence between the Commission’s recommendations and what was actually put in place.*According to a 1996 report, for the previous three decades, nursing in Israel had been undergoing an academization process. Experienced nurses had acquired an academic education and generic nursing schools had transitioned to providing academic training. Senior nurses saw academization as a way to transform nursing into a profession. Later, nursing as a profession would gain autonomy and independence (35). The nurses who testified before the Commission emphasized the need for autonomy and saw academization as a way to achieve this. Based on their questions to the nurses and their subsequent recommendations, the members of the Commission focused on finding an immediate answer to Israel’s nursing shortages. According to the 2022 Gamzu Committee report, it seems that the information on which the Commission had relied to make its recommendations had been lacking (21).

3. *To what extent was there congruence between the Commission’s recommendations in 1990, and what actually happened over the next three decades?* As the historical review shows, the Commission’s recommendations were never implemented. Moreover, its recommendations regarding nursing were actually contradictory. While it advised increasing the proportion of practical nurses and the number of practical nursing training courses, it also recommended developing nursing leadership and management, and examining the trend of academization. Regarding academization, which is where the recommendations are most at odds with what was actually put in place, it cannot be said that the Commission objected to this direction, since it advised examining academization. However, the expert witnesses who testified before the Commission—most prominently Ginzberg—were opposed to this trend. In the end, Israel never expanded its practical nursing training programs, and these were closed down in 1985. Studies suggest that practical nursing programs were only partially successful (36). As of 2024, the Israeli government provides scholarships for nursing students, in particular for graduates of other disciplines who wish to retrain as nurses, in an attempt to address the nursing shortage (37).

 Meanwhile, some of the Netanyahu Commission’s recommendations regarding nursing and medical training were never implemented—academic nursing courses were not closed (instead, 10 new tracks were created in colleges), and no medical schools were closed, (instead, two new schools have been opened).

**Conclusions**

Medical workforce planning is complex. It requires evaluating a number of factors, usually amid uncertainties regarding the future trends that could affect patterns of demand for health services and medical staff, future needs within the healthcare system, demographic change, morbidity trends, technological changes, geographical distribution, and shifts in working patterns (e.g., working hours and changes to retirement age). To these variables must be added the duration of professional training. Despite the complexities of the planning process, its importance to the efficiency and optimal running of the healthcare system is clear.

 The Netanyahu Commission, which made its recommendations in 1990, emphasized the need for a human resources directorate to be established in the Ministry of Health, and made frank reference to the lack of any centralized repository of data regarding staffing. Despite the obvious lack of detailed information to guide its recommendations on workforce planning, the Commission made two recommendations regarding staffing. These were based on data from other countries and the recommendations of foreign experts, who had no in-depth knowledge or experience of the Israeli healthcare system. In the fullness of time, these two recommendations would turn out to be a mistake, as Prof. Shani noted in a personal conversation with this author in September 2023. The Commission recommended reducing the number of medical schools in Israel. Even though this was never implemented, it suggests the Commission believed that Israel’s relatively high number of physicians in 1990 compared with the United States—a statistic highlighted by Ginzberg—meant it should reduce the number of physicians in the healthcare system in the future. However, as of 2024, Israel is suffering from a severe shortage of physicians, a situation that will only get worse if no significant changes are made. Regarding nurses, the Commission recommended examining the impact and cost benefits of academic nurses and increasing the number of practical nurses in the workforce. Again, this was based on recommendations from Ginzberg, which in turn were based on his work in the United States and his own personal beliefs at the end of his long career. In practice, contrary to the Commission’s recommendations, training courses for practical nurses in Israeli high schools were closed, and as of 2024, all nursing training in Israel is undertaken in academic colleges or universities. However, Israel still has fewer nurses than the OECD average (6.59 compared with 9 per 1,000 of population) (21).

Opposition from trade unions has meant that there is no licensing and re-licensing procedure for nurses in Israel. As a result, no one body has accurate information on the number of active medical professionals in Israel. There is also no clear and uniform definition of roles, and no distinction between nurses who are license holders and those who are actually currently working as nurses. There is also no data on the number of part-time nurses (38). Following her testimony to the Netanyahu Commission, Chief Nurse Ben Dov submitted a memorandum regarding relicensing for nurses, which the nursing division of the Israeli Ministry of Health considered positive for two reasons: a mandatory process of periodic performance review would generate an up-to-date dataset of nurses, and mandating that certain requirements be met in order for a license to practice to be renewed would help provide evidence of a nurse’s professional ability. Ben Dov predicted that in the future, the trade unions and institutions would oppose any move toward mandatory relicensing in favor of continued professional training that was not related to relicensing (39). Indeed, the issue has been dropped from the agenda. The 2022 Gamzu Committee did not include licensing in its recommendations. It is currently unclear whether the Israeli government holds up-to-date records of all practicing nursing staff in the country. The in-depth work of the Gamzu Committee includes individual recommendations at the end of each chapter. Future research could examine the extent to which these have been implemented and whether they have benefited the issue of medical workforce staffing in Israel.

 In nursing, new areas of expertise and many new training courses have been developed. These require proper planning and the allocation of additional staff, as well as higher levels of education for nurses, such as a doctorate in nursing. However, these developments also have the potential to attract new professional staff to nursing, which is also a topic for future research. The professionals who served on the Netanyahu Commission and the expert witnesses who testified before it each expressed their own opinions and positions. These were mostly based on limited data from the past and present, since they were not able to predict the future with the tools and information available to them. The advantage of historical research is its ability to unearth and unpack key issues in hindsight, with a view to improving decision-making in the future.

**List of Abbreviations**

HMO – Health Maintenance Organization.

OECD – Organization for Economic Co-operation and Development.

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