

Survey of Recent Halakhic Literature

Vaxxers and Anti-Vaxxers

I. Introduction

Halakhic policy regarding vaccination was reviewed comprehensively in this column, *TRADITION*, vol. 48, no. 2 (Summer 2015), pp. 41–56, in connection with controversy concerning inoculation against a then-recent outbreak of measles. That material was later published in this author's *Contemporary Halakhic Problems*, VII (Jerusalem, 2016), 449–468.

The flaw in that presentation is that the position of those opposed to vaccination was not documented. Nor could it have been. The chief exponent of that viewpoint is R. Shmuel Kamenetsky, Rosh Yeshiva of the Talmudical Yeshiva of Philadelphia. Rabbi Kamenetsky has been widely quoted by his followers but no reasoned exposition of that viewpoint was disseminated in writing. The necessary result is that the unexpressed must perform remain rebutted.

It was particularly because detailed arguments were not available and because the anti-vaxxers were extremely strident in expressing their position that they generated an aura of unusual knowledgeable. One or another of the masters of the *musar* movement asserted that, when an early-day authority prefaced a statement with the comment “*Yeira’eh li* – It seems to me,” the ensuing statement must be given greater weight than a declaration based upon either an explicit source or a reasoned argument. An argument can be countered; a text is subject to alternative interpretations and varying understandings that may simultaneously be the “words of the living God.” In contrast, “It seems to me” is an invocation of familiarity with the entire corpus of the rabbinic canon rather than an isolated proof-text. A single source is subject to contradiction by another source; but who would have the temerity to challenge the impact of “*Yeira’eh li*” if followed by a conclusion based upon an eminent authority’s keen understanding of the entirety of Torah scholarship?

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Since then, issue 78 of the Torah journal *Or Yisra'el*, vol. 24, no. 2 (Adar II, 5779), featured a symposium consisting of five contributions endorsing vaccination followed by a clear and extremely concise opposing statement authored by R. Shmuel Kamenetsky accompanied by an article prepared by one of his disciples, R. Daniel Asher Kleinman, elucidating his teacher's position. Truth to tell, there is indeed not very much in that material that is new. However, "*i efshar le-bet ha-midrash be-lo ḥiddush* – there cannot be a house of study without a novel insight" (*Haggigah* 3a).

II. Definition of Danger

The fact that, on rare occasions, a vaccine may prove lethal does not *ipso facto* mean that it should be renounced. In his *Torat ha-Adam*, Ramban declares that such is the case with regard to all medicaments: "For there is no medication that heals one [patient] that does not kill another."¹ The question is how high must the mortality rate attributed to a therapeutic measure be before it is to be discouraged or banned. The rule of *rov*, or majority, does not apply to matters of life-threatening danger. The issue is how grave a risk should be assumed in order to avoid possible disease or illness. What is the threshold mortality rate that would render fear of a lethal result a matter of halakhically recognized statistical probability requiring the patient to abjure the remedy on grounds of possible *pikuaḥ nefesh*? What is the threshold mortality rate beyond which a person may not inflict a danger upon others or, conversely, the degree of danger that justifies imposition by society of measures designed to protect the public, e.g., mandatory immunization or denial of access to public places?

Pikuaḥ nefesh is an imperative mandating intervention but certainly not if the intervention itself will prove fatal. The non-applicability of the principle of *rov* results in an absence of an obligation to intervene if the intervention may be lethal rather than life-saving. Nevertheless, many legal systems posit a principle in the nature of "*de minimis non cogit lex* – the law does not concern itself with trifles." A possibility so far removed from becoming actualized as to be infinitesimally small is regarded as non-existent.

In his contribution to the symposium, R. Moshe Sternbuch cites *Magen Avraham, Oraḥ Ḥayyim* 316:23, who rules that it is forbidden to kill a poisonous spider on *Shabbat* because it is highly unlikely that it will fall into food that will be consumed and, even if that were to occur, the possibility that the insect would render the food dangerous for human consumption is only "one in a thousand."² According to *Magen Avraham*, the

1 *Kitvei Ramban*, ed. R. Bernard Chavel (Jerusalem, 5724), II, 43.

2 Cf., *Magen Avraham, Oraḥ Ḥayyim* 330:3.

presence of such a creature is not regarded as a cognizable danger only because of two factors: the unlikelihood of the spider falling into a food that will be consumed coupled with a one in a thousand chance that falling into the food would result in a hazardous situation. Those two factors render killing the spider on *Shabbat* impermissible. Apparently, were the likelihood of such a risk to be only the one in a thousand chance of loss of life that arises from eating the food into which the spider has fallen, it would be recognized as a significant danger and elimination of that hazard would constitute *safek pikuah nefesh*. Thus, a risk of one in a thousand is considered a matter of *pikuah nefesh* that supersedes biblical prohibitions. Similarly, *Teshuvot R. Akiva Eger*, no. 60, rules that only a probability of “one in many thousands” is not deemed to be *pikuah nefesh*. The inference is that a probability of one in a thousand does indeed satisfy the definition of *pikuah nefesh*.³ On the other hand, *Maggid Mishneh, Hilkhot Shabbat* 2:11, states that the risk of maternal death in childbirth is less frequent than one in a thousand⁴ but, nevertheless, childbirth is considered

3 See also R. Ishmael ha-Kohen, *Teshuvot Zera Emet*, II, no. 32, s.v. *kol zeh*, who, in discussing the danger of vaccination, states that “even if we were to fear that one in a thousand will die . . .” and *ibid.*, s.v. *akhen*, “and even if the reality were different and the probability were that one in a thousand will die . . .”

4 *Maggid Mishneh* is cited as normative by *Mishnah Berurah* 330:5. *Maggid Mishneh*, who lived in Spain during the later period of the 14th century, does not seem to be factually correct in his estimate of the frequency of maternal deaths during his lifetime. Currently, in high-income countries, the risk of maternal death is 13 per one-hundred thousand live births (much fewer than one in one thousand) but approximately 430 per hundred thousand, or 4.3 per thousand, in low-income countries. See “Maternal Mortality,” (World Health Organization), April 26, 2024.

Rudimentary estimates for the rate of death in childbirth during earlier periods are available based on registers maintained by a limited number of Church of England parishes between the 16th and 18th century. See B. M. Willmott Dobbie, “An Attempt to Estimate the True Rate of Maternal Mortality Sixteenth to Eighteenth Centuries,” *Medical History*, vol. 26, no. 1 (January, 1982), pp. 79–90. Dobbie reports that in one parish there were 3,236 baptisms and 76 maternal deaths, or 23.5 deaths per thousand baptisms from 1583 to 1599. Dobbie further cites Thomas Rogers Forbes, *Chronicle from Aldgate 1583-1599: Life and Death in Shakespeare’s London* (New Haven, Conn., 1971), p.106 and William Heberden, *A Collection of the Yearly Bills of Mortality from 1657 to 1758* (London, 1759), who states that, in the years surveyed, there were 296,810 baptisms and 4,720 women recorded as dying in childbirth, a rate of 15.9 per thousand baptisms. Dobbie also notes that Audrey Eccles, *Bulletin of the Society of the Social History of Medicine*, vol. 20, no. 10 (1977), p. 85, basing herself upon “typical parish registers,” estimates the rate as having been ten to fifteen maternal deaths per thousand births. Those figures are, of course, approximations. Moreover, those statistics do not include stillbirths in which a woman perished together with her child or women whose children died shortly after birth and hence were not baptized.

The office of the Registrar General was established in England in 1837 to determine the number of persons who died from various causes. The present rate of maternal death in childbirth in England and Wales is 0.11 per thousand.

by Halakhah to be a matter of *pikuaḥ nefesh*.⁵ The problem, then, is, if one in a thousand is regarded as *pikuaḥ nefesh*, how low must the probability of death be for the act or event to be regarded as so remote as not to be considered as an instance of even possible *pikuaḥ nefesh*. How remote is remote? What is the upper limit of statistical probability that is defined as *de minimis*? One searches in vain for a precise resolution of that issue.⁶

R. Moshe Sternbuch resolves the apparent conflict between the above-cited authorities by drawing a distinction between the definition of a presently existing danger and the likelihood of a danger that will arise in the future. A future danger must be taken into consideration only if the probability of that danger becoming actualized with resultant loss of life is at least one in a thousand instances. However, once that danger is actually present, it must be avoided even if the probability of mortality is even less than one in a thousand.⁷ If so, there is no controversy between the above-cited authorities.⁸

Another participant in the symposium, Dr. Mordecai Halperin, records an interesting anecdote that, in this writer's opinion, seems to further sharpen the definition of danger. A child who had been vaccinated against measles died shortly thereafter. The cause of death was unknown. In order to determine whether the vaccine was somehow implicated in the child's death the physicians sought to perform an autopsy. R. Joseph Shalom Eliashiv was consulted with regard to the permissibility of an autopsy under those circumstances. His response was that, in order to sanction a post-mortem examination, information to be derived

The earliest figures published by the Registrar General begin with the year 1840. From then until the end of the century the recorded death rate varied between four and six per thousand live births. From 1900 to 1930, the rate was constant at approximately 4.25 per thousand. Only after 1930 do the rates fall lower than one in one thousand. Thus, it would be surprising if the rate of maternal deaths in fourteenth-century Spain was indeed less than one in a thousand as stated by *Maggid Mishneh*.

Moreover, one of the *Takkanot Shum* (Speyer, Worms and Mainz), promulgated sometime during the thirteenth century, provided for return of the dowry if the wife died during the first year of marriage. See Menachem Elon, "Takkanot," *Encyclopedia Judaica*, XV (Jerusalem, 1971), 726. Presumably, that provision reflected the high rate of mortality during childbirth, particularly for primiparas.

5 Cf., Rashi, *Bava Mezi'a* 6b, s.v. *kullan*.

6 R. Moshe Sternbuch, *Teshuvot ve-Hanhagot*, V, no. 399 (p. 597), cites R. Shlomo Zalman Auerbach, *Minḥat Shlomo*, II, no. 29, who maintains that a "one in a hundred" chance of *pikuaḥ nefesh* is sufficient for suspension of Sabbath restrictions. Rabbi Sternbuch himself (p. 595) asserts that the matter depends upon human perception and suggests that most persons regard a two percent chance of fatality to be a *safek sakkanah*.

7 To be sure, there is no act that does not carry with it some element of risk. Clearly, some dangers are so remote that they may be ignored. How low that danger must be is not spelled out. See *infra*, notes 15 and 20.

8 Cf., *Teshuvot ve-Hanhagot*, V, no. 399 (pp. 592–595).

therefrom must be of at least potential benefit in saving the life of another patient. In the situation presented to him, there was extremely little likelihood that there would be any such benefit. Under those circumstances, an autopsy might yield a beneficial result only if (1) the vaccine was somehow implicated in the death of the child, (2) such a causal connection would indeed be discovered, and that (3) having established the nature of the danger, it would be obviated by appropriate treatment. Rabbi Eliashiv's response was that too many hypotheticals would have to be aligned for the autopsy to be of actual value in treatment of another patient.

Nevertheless, Rabbi Eliashiv did suggest that his interlocutors confer with R. Shlomoh Zalman Auerbach. The latter's response was that if, in the unlikely event that the autopsy would yield pertinent information, the ramifications would affect not simply a single individual, but the public at large. If so, he argued, even if the possibility of learning anything of value from the autopsy is extremely remote, the procedure may be undertaken because, if fruitful, the benefit would not be the rescue of a single life but would benefit the public at large. Ostensibly, his distinction is simply between an autopsy performed for the potential benefit of a single person, or a small number of persons, and an autopsy with a remote potential of rescuing a vast number of patients.

To this writer, however, the criteria for performing a post-mortem examination designed to learn how to treat but a single patient and the criteria that must be applied in order to prevent a public health crisis are one and the same. In both cases, the standard is more than a "one in a thousand" chance that a life would be saved thereby, i.e., a one-tenth of one percent likelihood of saving a life. If only a single patient suffers from the identical disease and the intervention is targeted to discover some information that might save even a single life, the one-tenth of one percent standard applies. If the death rate in the wake of possibly hazardous immunization is one-tenth of one percent or higher, a post-mortem examination is warranted only in order to prevent that single death by showing that immunization was the cause of the death that had occurred or by providing information leading to a cure for the existing patient. The issue is to what does the more than "one in a thousand" possibly apply.

If a vaccine proves to be toxic, it is not the case that only one in a thousand will succumb as a result of immunization. The number of victims who will perish will be far greater because the vaccine, or a particular batch of the vaccine, will have been administered to a large number of individuals. The risk of *any* fatality resulting from immunization may be one in a thousand but, if the vaccine or a batch of the vaccine is indeed lethal, the loss of life will be far greater than one in a thousand. Put somewhat differently, there is only a one in one thousand chance that

the vaccine will cause anyone's death but if, for any reason, it *does* cause death, the number of fatalities among the people who receive that vaccine will be far, far higher than one in a thousand. It would seem to be that this consideration is why Rabbi Auerbach regards communal threats or epidemics in a different light. The occurrence of any fatality ascribable to a vaccine may be far less than one in a thousand, but when such a calamity does occur, the result is not, a single death but entails a considerable number of fatalities.

Rabbi Eliashiv dismisses the question of the permissibility of an autopsy because he assumes that the focus is upon whether an otherwise forbidden act will lead to saving a life. Unless there is a more than one in a thousand chance that the act will actually be an act of rescue there is no warrant for violation of the corpse. On the other hand, according to Rabbi Auerbach, the focus must be, not upon the likelihood of an otherwise forbidden act becoming an act of rescue but upon the likelihood that even a single life would be saved if the vaccine does indeed prove to be dangerous. When there is even a one in a thousand chance that multiple lives would be saved the autopsy is warranted even though the chance that the autopsy would prove to be beneficial in less than one in a thousand.

The divergent rulings of Rabbi Eliashiv and Rabbi Auerbach seem to be grounded in differing understandings of the definition of *sakkanah* as a danger having a likelihood of at least one in one thousand of resulting in death. Rabbi Eliashiv seems to assume that the definition focuses upon the violation being permitted for purposes of *pikuaḥ nefesh*. His understanding seems to be that the prohibited act can be sanctioned only if the act has a one in a thousand chance that it will prove to be entirely permissible because it will have been proved to have been an act of rescue.

Rabbi Auerbach, on the other hand, seems to understand that the requirement of a likelihood greater than one in a thousand does not arise from an analysis of the act compared to other acts but to the likelihood that even a single life will be preserved. Thus, the determination that there is only a one-in-one-thousand chance that the act in question will actually become an act of rescue is not crucial. The focus of the definition of greater than one in a thousand is upon the probability of how many lives may be saved. If the probability is more than one in one thousand that a single life will be preserved the transgression is suspended even if the probability that the act will become an act of rescue is far less.⁹

9 The point is illustrated by the following example: Assume that there are one thousand airplanes. Nine hundred and ninety-nine airplanes are each carrying a single passenger; one airplane is carrying fifty passengers. It is within the power of an external observer to attempt to prevent one of the airplanes from crashing, but he cannot choose which one will not crash. There is only a one in one thousand

III. Endangering Others

Rabbi Sternbuch acknowledges that there would be grounds for considering the opinion of those doctors who maintain that the percentage of fatalities attributed to the vaccine is far higher and, consequently, to refrain from vaccinating one's children, but for the fact that the opinion of those practitioners is countermanded by a majority of physicians. Although the opinion of a minority of medical practitioners is given credence by Halakhah, that is the case only when a majority find no danger to life in following the opinion of the minority, e.g., eating on *Yom Kippur*. In the case of immunization, each position is regarded as dangerous by its opponents. Hence, the course of action is to be determined by the majority. Moreover, asserts Rabbi Sternbuch, although a father may himself decline to be vaccinated because he chooses not actively to seek one

chance that he can prevent the crash of even that single plane. Assume that the act of rescue involves transgressing a *Shabbat* commandment. According to Rabbi Eliashiv intervention would not be sanctioned because the requirement for achieving rescue by means of that act is not greater than one in one thousand. Nevertheless, there is a one in one thousand chance that he will save fifty lives. If so, he will have saved more lives than one in one thousand. Viewed from the vantage point of rescue from death, the chance of saving *a* life is greater than one in one thousand. Thus, according to Rabbi Auerbach, who focuses upon the number of lives saved, intervention on *Shabbat* would be warranted.

Recognition that the more passengers in even one airplane increases the probability that more passengers may be saved is intuitive and may also be demonstrated mathematically. In this hypothetical, the statistical probability is that the person who intervenes will succeed in rescuing 1.049 individuals. The expected value of the lives saved in this scenario can be represented by the following formula $\sum_{\text{airplanes } i} P_i \times V_i$, where P_i denotes the probability of rescuing a specific airplane and V_i denotes the number of lives that will be saved if that plane is rescued. Using the specific values given, we have

$$\left(\sum_{i=1}^{999} \frac{1}{1000} \right) + \frac{50}{1000} = \frac{999}{1000} + \frac{50}{1000} = 1.049.$$

But it is impossible to rescue .049 of a person. If Halakhah requires more than a one in one thousand chance of saving a life, the proper hypothetical would be nine hundred and ninety-nine planes carrying one passenger and one plane carrying at least a thousand and one passengers. That hypothetical would result in a statistical probability of saving two lives:

$$\frac{999}{1000} + \frac{1001}{1000} = 2$$

In the case of an epidemic as addressed by Rabbi Auerbach, a potentially toxic vaccine is likely to be administered to thousands of persons. There is only a one in one thousand chance that an autopsy will yield life-saving information; but if the autopsy does yield such information, the number of lives saved will be far in excess of one in one thousand.

danger in order to avoid another danger, the father's obligation to his children mandates that he inoculate them against disease.¹⁰

In the measles epidemic of 2013 the mortality rate in Israel of those who contracted measles was reported to Rabbi Sternbuch as being "one out of one thousand," i.e., one-tenth of one percent. When such an outbreak already exists, asserts Rabbi Sternbuch, vaccination of one's children is incumbent upon the father. Rabbi Sternbuch correctly dismisses the danger of mortality associated with the vaccine as negligible to non-existent.¹¹ Although not discussed by Rabbi Sternbuch, instances of serious side-effects are also extremely low. According to Rabbi Sternbuch, there is no question that in a time of contagion an unvaccinated person may not foist his presence upon others.¹² Similarly, parents of unvaccinated children have no right to compel a day school or a yeshiva to accept those children as students. In articles appearing in the same publication, both R. Asher Weiss and R. Gavriel Zinner concur in the opinion that unvaccinated students should be banned from the classroom.

Dr. Abraham S. Abraham, *Nishmat Avraham*, 2nd ed. (Jerusalem, 5767), *Hoshen Mishpat* 426:8 (p. 229), cites R. Joshua Neuwirth as opining that parents who fear that the vaccine itself may cause serious problems cannot be forced to immunize their children.¹³ Rabbi Neuwirth presumably gave credence to reports that vaccination against measles can, at times, have deleterious results. Addressing the same question, Rabbi Zinner similarly states that, although they should be encouraged to do so, parents are not required to vaccinate their children. However, concludes Rabbi Zinner, such may be the case if the sole danger of the vaccine itself is to the unvaccinated child but if there is a possibility that the child may spread the

10 See *infra*, note 27 and accompanying text.

11 Strangely, R. David Zevi Hoffmann, *Melammed le-Ho'il*, II, no. 104, rules that in all cases in which Halakhah sanctions acceptance of possible danger for purposes of restoring normal longevity anticipation the physician must proceed even against the express wishes of the patient or of the patient's parents. For a further discussion of contradictory views, see J. David Bleich, *Bioethical Dilemmas*, II (Southfield, Michigan, 2006), 245–258 and *infra*, note 18 and accompanying text.

12 Rabbi Sternbuch indicates that his position was first announced in response to an inquiry from R. Malkiel Kotler, Rosh Yeshiva of Beth Medrash Govoha, who, reportedly, vigorously asserts that *yeshivot* may not reject unvaccinated children.

13 Assuming that the morbidity rate is negligible, R. Yitzchak Zilberstein, *Shi'urei Torah le-Rofe'im*, III, 559, rules that it need not be disclosed by a physician. Rabbi Zilberstein states that a physician need not disclose a morbidity rate of 3% or less on the assumption that everyone would accept such a risk. In light of current medical information and present-day experience it would appear that the dangers associated with vaccines do not rise even to a level requiring application of *shomer peta'im*. See *infra*, note 15.

disease to others, e.g., a student enrolled in a school, the parents may be compelled to vaccinate the child.

For the same reason, just as, for example, one may not smoke in a public place because it endangers others,¹⁴ unvaccinated children should be prevented from attending school. There are indeed persons who steadfastly deny that cigarette smoking causes danger or that second-hand smoke poses danger. Nevertheless, since the overwhelming majority of knowledgeable physicians regard both smoking and inhaling second-hand smoke as fraught with danger, no one has the right to generate a hazard to others by smoking in a public place.¹⁵ Presence of an unvaccinated student poses a danger to all other students.¹⁶ Every person who recognizes the danger has the right to prevent imposition of such danger upon the public.¹⁷

Recognizing that, as is the case with smallpox vaccine, immunization, in some few cases, may foreshorten life rather than protect against contracting the illness, the result would be that acceptance of the risk

14 For a fuller discussion of smoking in public places see J. David Bleich, "Of Tobacco, Snuff and Cannabis," *Contemporary Halakhic Problems*, VIII (Jerusalem, 2024), 480–490.

15 It would have seemed to this writer that the point of demarcation between a risk that may be freely accepted and imposed upon others as well and a risk that is unacceptable is whether the activity in question is within the parameters of "*shomer peta'im Ha-Shem* – the Lord preserves the simple." If so, a person would be permitted to expose himself to a risk that is below the threshold of *shomer peta'im* and might also expose others to such a low-level degree of danger. The latter point is reflected in the ruling recorded in *Yevamot* 72a to the effect that a father may circumcise his son on a cloudy day based upon the principle of *shomer peta'im*. However, *Nimmukei Yosef*, in the opening section of his commentary on the eighth chapter of *Yevamot*, and Ritva, *Yevamot* 72a, cited by *Bet Yosef*, *Yoreh De'ah* 262, rule that a person may decline to be circumcised on a cloudy day even though the danger is within the relatively low category of *shomer peta'im*. Cf., however, *Yam shel Shlomo*, *Yevamot*, chap. 8, no. 4 and R. Menachem Mendel Schneersohn, *Teshuvot Zemaḥ Zedek, Even ha-Ezer*, no. 11, sec. 8.

Nevertheless, even according to *Nimmukei Yosef*, there must be a lower level of danger that is *de minimis* and does not rise even to the level requiring invocation of the principle of *shomer peta'im*. Thus, a father must transport his son to the home of the *mohel* despite the risk of a fatal attack while in transit. The father cannot plead exemption from the *mizvah* by claiming that such risk is accepted only on the basis of *shomer peta'im*. The point of demarcation of such *de minimis* danger that must be accepted and danger within the ambit *shomer peta'im* that, according to *Nimmukei Yosef*, need not be accepted, is difficult to ascertain.

16 For a fuller discussion of *shomer peta'im* see "Hazardous Medical Procedures," *Bioethical Dilemmas*, II, 239–275 and *Contemporary Halakhic Problems*, VIII, 474–480 and 490.

17 It would seem that imposition of a danger above the threshold level of *shomer peta'im* is forbidden even if the potential victim does not protest. Thus, an unvaccinated child should not be permitted to attend school even if no one raises an objection.

is discretionary, as is the case with regard to risking *ḥayyei sha'ah* in anticipation of normal life expectancy.¹⁸ Nevertheless, it seems that, even accepting that premise, there would be no basis to demand that a school admit an unvaccinated child as a student. A person may reject the risk of even a hazardous procedure for himself but has no right to impose a concomitant risk upon others. A person afflicted with a contagious disease who is allergic to the only antibiotic effective against that disease may – and, in extreme cases, must – refuse the medication but, since he remains contagious, he has no right to enter a public area and expose others to danger. Thus, even assuming that a person also has a right to refuse vaccination of his children, there would be no basis to demand that schools accept unvaccinated children as students.

In support of that position, R. Asher Weiss cites the rulings of *Shulḥan Arukh*, *Ḥoshen Mishpat* 153:1, and *Rema*, *Ḥoshen Mishpat* 153:3, regarding the prerogatives of townspeople to compel all residents to contribute to the cost of erecting fortifications around the city and to participate in guard duty or to hire guards as indicating that a person is obligated to protect against future danger. Actually, those regulations do not necessarily reflect an obligation to protect against danger; they may simply reflect the right of every individual to demand that other citizens contribute to defraying the cost of amenities necessary for the common good. Defense against future danger is certainly an amenity. Accordingly, society and its members do have the right to demand that such possible risks be avoided if for no other reason than elimination of such risks is a societal amenity. In any event, there is scant practical difference whether elimination of future danger is the obligation of the individual or the rightful prerogative of the public.

A clear precedent for the power of society to exclude a person possibly afflicted with a contagious disease is found in R. Chaim Pelaggi, *Nishmat Kol Ḥai*, *Ḥoshen Mishpat*, no. 49. The situation involved a physician who had been treating patients during the course of an epidemic. The officers of a synagogue sought to deny him entry onto the premises because of their fear of contagion. The physician offered to construct walls around his pew and also to arrive before other worshipers and remain after services until all others had vacated the sanctuary.¹⁹ The physician noted that, as was

18 See Bioethical Dilemmas, II, 246–275. Cf., *Teshuvot ve-Hanhagot*, V, no. 399 (pp. 593–595).

19 The interlocutor cites a ruling of the Mishnah, *Nega'im* 13:12, permitting a leper to enter a booth erected for him in a synagogue so that he would not defile others. *Nishmat Kol Ḥai* ignores that citation, presumably because *ḥamira sakkanta me-issura*, i.e., physical danger is a more serious consideration than avoidance of transgression and, hence, he rejects that expedient as insufficient protection against contagion.

common practice in days gone by, he had purchased his pew and, hence, he claimed, he could not be barred from entry into his own property.

Nishmat Kol Hai cites *Tosafot, Bava Kamma* 23a, s.v. *u-lihayyev*, who observe that “a person must be more careful in preserving others from harm than with regard to preserving himself from harm.” *Nishmat Kol Hai* praises the physician for accepting the risk involved in treating patients afflicted by a contagious disease but nevertheless rules in favor of the synagogue officials who denied the physician access to his synagogue pew.²⁰

IV. Herd Immunity and the Categorical Imperative

It has been argued that the phenomenon of herd immunity constitutes grounds for abjuring inoculation. Epidemics occur because pathogens are spread rapidly from person to person. Each infected individual has the potential to infect a host of other persons. Thus, the disease is capable of spreading exponentially. As vaccinated persons develop antibodies, they become protected against the disease. A person who does not contract the disease cannot spread it to others. As a result, when a high percentage of a population is immunized, the disease has fewer potential victims. If a very high percentage of the population is immune to the disease, it becomes difficult for the bacteria or virus to find an appropriate host. Thus, the epidemic will cease to spread for lack of victims. If some statistical majority of the population is immunized, the ability of the pathogen to find victims will plunge precipitously and even unvaccinated individuals will, for all intents and purposes, be immune to contagion. That phenomenon is known as herd immunity or herd protection.

Of course, every member of a community might claim that he or she need not be vaccinated because, if everyone else is immunized, the sole unvaccinated person will neither contract the disease nor be capable of infecting anyone else and hence will pose no risk to others. If a defined minority will enjoy the benefit of herd immunity, there is no need to insist upon vaccination of everyone. However, if everyone asserts a claim to be member of that minority, the claim becomes entirely spurious. No one would be immunized and the epidemic would spread rapidly. If no one is vaccinated, herd immunity cannot develop. But does an individual have a right to declare that he or she has no obligation to be vaccinated because all others can readily protect themselves by means of vaccination?

20 Presumably, if God safeguards the “foolish,” the *peti* recognizes the danger but ignores it. [Cf., *Teshuvot Zemaḥ Zedek, Even ha-Ezer*, no. 11, sec. 8, for citation of an authority who rules that a person who recognizes the danger may not avail himself of the principle of *shomer peta'im* because he is no longer a *peti*.] If so, then, dangers not recognized as such because of their remote nature are below the threshold of *shomer peta'im*.

There are several sources indicating that such an assertion cannot be countenanced. The Gemara, *Sanhedrin* 109b, states: "If an individual had rows of bricks, every person came and took one, saying, 'I have taken only one.' If an individual spread out garlic or onions, every person came and took one, saying, 'I have taken only one.'" Rashi explains that each person might claim with justification that the loss to the owner is negligible but, in the aggregate, each person's action causes the owner to suffer a significant harm. The Palestinian Talmud, *Bava Mezi'a* 4:2, and *Bereshit Rabbah* 31:5, declare that such was the comportment of the generation of the Deluge and is the phenomenon referred to in the verse "and the earth was filled with violence" (Genesis 6:13). If an individual had a bag full of *turmisin* (presumably some type of seed or pod), each of which being of minimal value, other people might steal only one pod from the bag but soon the bag would become entirely empty.

Those texts support the moral principle later developed by Immanuel Kant known as the categorical imperative. Kant proposes a simple test to determine whether or not any contemplated action can be accepted as moral. A person may be correct in assuming that a contemplated act is innocuous. But the question that must be asked is: Were such an act to rise to the level of universal practice, would he be willing to accept the result? If the answer is negative, the act must be regarded as immoral and cannot be performed by the individual even if no harm ensues. In essence, that concept represents an "equal protection of law" doctrine in the moral sphere. A person cannot claim a privilege that he would not grant to others. If every person cannot assert a right to perform a particular act, no one can assert such a right.

Kant postulates a fundamental moral law grounded in practical reason. Law, by its nature, is universal. A maxim is defined by Kant as a subjective principle of volition. Obedience to moral law demands that our maxims have the form of universal law, i.e., of universal applicability. According to Kant, the result is: "I am never to act otherwise than so that I can also will that my maxim should become the universal law."²¹ The notion that a person may act in a particular manner only if he also wills that his "maxim" become a universal law is termed by Kant a "categorical imperative." Elsewhere, Kant formulates the moral rule embodied in his doctrine of the categorical imperative with slight variations. Thus, Kant writes, "Act only on that maxim through which you can at the same time will that it should become universal law"²² and "Act as if the maxim of your action were to become, through your will, a Universal Law

21 *Groundwork of the Metaphysics of Morals*, trans. H. J. Paton (London, 1950), p.421.

22 *Kant's Critique of Practical Reason and Other Works on the Theory of Ethics*, trans. T. K. Abbott, sixth ed. (London, 1909), p. 38.

of nature.”²³ The principle may perhaps be couched somewhat differently: “Do not claim a right for yourself that you do not also ascribe to others.” That moral principle is certainly a forceful reaction to a claim of self-exemption from vaccination on the basis of the existence of herd immunity.

V. The Position of the Anti-Vaxxers

Dr. Edward Reichman, *The Anatomy of Jewish Law* (New Milford, Conn., 2022), pp. 378-380, traces the opposition to vaccination on religious grounds to the close of the nineteenth century. In response to a smallpox epidemic, the British Parliament enacted a law requiring universal vaccination. Claiming vaccination to be a violation of his religious principles, a certain Jew, Mr. Henry Levy, refused to allow his son to be vaccinated. He was charged with a criminal offense and imprisoned for that infraction. The Crown prosecutor was a fellow Jew, Mr. John Harris. Public meetings were organized in support of the imprisoned father. The public controversy caused the erstwhile prosecutor to have pangs of conscience regarding his role in the matter. He proceeded to consult the then Chief Rabbi, Rabbi Dr. Hermann Adler, for religious guidance. Responding to Mr. Harris, the Chief Rabbi stated that the use of vaccination as a prophylactic against smallpox “was in perfect consonance with the letter and spirit of Judaism.”²⁴

Rabbi Adler’s response aroused the ire of one of the vociferous supporters of the imprisoned father. Mr. J. H. Levy (not a relative of Mr. Henry Levy), a member of the faculty of what was then known as the City of London College, soon published a short monograph entitled *State Vaccination With Special Reference to Some Principles of Ancient Judaism*, in which he challenged Dr. Adler’s understanding of Halakhah and, moreover, asserted that the Chief Rabbi lacked the authority to render determinations of Jewish law. Mr. Levy advanced two distinct anti-vaccine arguments based upon his own understanding of biblical law: (1) The dietary code as well as certain other biblical commandments represent prescriptions for healthful living. Assuming that it would be impermissible for a *shoḥet* to slaughter any animal afflicted by a disease for consumption by a Jew, Levy presumes that, *a fortiori*, a Jew may not inject material derived from a diseased animal into his body. (2) Commingling different species (including, we are told, any two vegetable species) is a biblical offense. Interbreeding of animal species is forbidden. *Ipsa facto*, introducing animal derivatives into a human body is included in those prohibitions.

23 *Ibid.*, p. 39.

24 J.H. Levy, *State Vaccination With Special Reference to Some Principles of Ancient Judaism* (London, n.d.), p. 2.

It should logically follow that J.H. Levy's Judaism would also ban insulin, implantation of the heart valve of a pig in a human patient and any other xenograft as well. We need not speculate with regard to a Karaite reaction to this type of argumentation, but any Jewish schoolchild could readily identify J.H. Levy's fundamental errors. Most insidious was his claim that his understanding of Jewish law should be as authoritative as that of the Chief Rabbi of the British Commonwealth.²⁵

Presenting the position of the current antivaxxers, R. Daniel Asher Kleinman explains that the position that children need not be vaccinated against measles and that *yeshivot* may not exclude them for that reason is based upon two considerations:

1) Measles does not carry with it a one in a thousand chance of fatality. Indeed, in at least one report taking into account cases of measles contracted between 1950 and 1960, the mortality rate was only one in seven thousand. In another year, the number was one in two thousand. Hence, it is argued, measles does not constitute a "danger," with the result that

25 J.H. Levy's rejoinder bears citation both for its profound ignorance and as an insight into the mindset of certain sectors of the laity in the nineteenth century. Levy declaimed: Those who wish to find the basis of my opinion should turn to Leviticus, chapter 19, verse 19, and Deuteronomy, chapter 22, verses 9 to 11. The crossing of animal with animal, and even of vegetable with vegetable, is here forbidden. I need scarcely tell even casual readers of the Pentateuch that still more is the crossing of the animal and the human forbidden. And this is not a mere casual or isolated law. It is harmonious with a whole body of laws relating to regeneration on the one hand, and hygiene on the other. What is the use of the elaborate regulations prohibiting the use of unclean animals as food, if animal filth of the most virulent description is introduced directly into the human blood? What is the sense of turning up one's nose at a grafted orange and grafting on a healthy child microbic 'lymph' from a diseased cow? (*State Vaccination*, p. 2) . .

I think I am right in saying that no *shohhet* would kill for Jewish food, a calf suffering from cow-pox. If I am not right in this, I ought to be. But what could be more absurd than to prohibit the eating of the flesh of such a calf on account of its disease, and still taking the matter of that disease and inserting it directly in the blood of our healthy children? . . . As unclean matter, as morbid matter, as beastly matter, it is alike repugnant to the essence of old Jewish code to mix it with the life-blood of a Jewish child. That is my opinion, and I am not to be moved from it by any mere dogmatic assertion of ecclesiastical authority. The people of Israel were misled once before by ecclesiastical authorities in the matter of a calf, while the prophet was seeking inspiration in the Mount. (*Ibid.*, p. 14)

In a final comment, Levy asserted:

As for Dr. Adler's pretention to decide for another man that there exists no objection to vaccination on religious grounds, this appears to me the height of arrogance . . . the right of any ecclesiastic to come unsolicited between individual and his own judgment of religious duty is one which I hope my fellow Israelites will never concede. (*Ibid.*, p. 18)

there is no obligation to vaccinate children against measles and schools do not have the right to deny registration of unvaccinated children.

That argument misses the mark. In years gone by, the mortality rate for leprosy was also less than one per thousand. Yet lepers were consigned to a leper colony, for good cause. The disease was highly contagious and the morbidity rate was much higher than one in a thousand. The same is the case with regard to morbidity associated with measles. Fathers are obligated to provide for nutritional needs of their children.²⁶ The question of whether included in that obligation is also anything necessary for a child's health and welfare has not been discussed in detail by halakhic authorities.²⁷ If the father is under such obligation, it would include not only immunization against a potentially fatal disease but also prophylactic measures designed to prevent any illness and preserve good health. Measles may cause various forms of morbidity, including possible blindness. Be that as it may, as previously noted, an individual does not have the right to inflict either economic or physical harm upon others. A person does not have the right to impose the presence of his possibly contagious child upon others.

2) The second argument is that an unvaccinated person who is not contagious poses no imminent threat to others. The threat arises only when that person actually contracts measles. The right to exclude a person afflicted with measles from a public area is not challenged by the anti-vaxxers. But the danger of an uninoculated, but presently healthy, person lies only in the future. Since Halakhah limits definition of a dangerously ill person to a *holeh le-faneinu* – a patient physically “before us” – i.e., a clear and present danger, a threat to life that lies only in the future, it is argued, may be ignored.

That argument is faulty. The standard of *holeh le-faneinu* applies only to the definition of “danger” for the purpose of resultant suspension of religious prohibitions, e.g., violation of *Shabbat* regulations or post-mortem examinations, but not to personal or paternal obligations to protect or maintain the wellbeing of oneself or of one's children.

Moreover, Rabbi Kleinman's argument is based upon a caveat with regard to the definition of “danger” formulated by R. Moshe Sofer, *Teshuvot Hatam Sofer, Yoreh De'ah*, no. 336 and, impliedly, by R. Ezekiel Landau, *Teshuvot Noda bi-Yehudah, Yoreh De'ah, mahadura tinyana*, no. 210. Preservation of life takes priority over the prohibition against violating a corpse but, contend those authorities, only if there is a *holeh le-faneinu*, i.e., an already existing, seriously-ill patient who may conceivably benefit

26 See *Shulhan Arukh, Even ha-Ezer* 71:1.

27 See R. Jacob Blau, *Pithei Hoshen*, VIII, 9:35, note 87.

from information gleaned from the autopsy. To be sure, much valuable medical information has been derived from routine post-mortem examinations. Yet, if such possibilities would be sufficient to warrant suspension of the prohibition against *nivvul ha-met*, or violation of a corpse, the result would be a *reductio ad absurdum*, viz., suspension of all biblical prohibitions would be warranted because of the remote possibility that the contemplated act might, in some unanticipated way, result in the preservation of a life. As expressed by *Noda bi-Yehudah*, a mother of a perfectly healthy child would be justified in gathering wood, kindling a fire and boiling milk on *Shabbat* morning so that, should her child become ill during the course of the Sabbath day, warm milk will be available without delay. Such serendipitous benefit does not trigger an exclusion from *Shabbat* prohibitions on the basis of *pikuah nefesh*. Suspension of such prohibitions requires a cogent causal nexus between the otherwise proscribed act and the potential rescue of human life.²⁸

Rabbi Kleinman assumes that the concept of *holeh le-faneinu* denotes only an actual, already afflicted patient. Rabbi Kleinman argues that prophylactic immunization to protect potential victims of a disease is not of that nature. At the time of vaccination there is no *holeh le-faneinu*; there is no presently endangered life. Hence, there is no obligation to institute measures to benefit victims who, as yet, do not exist. Consequently, particularly if administration of a vaccine is accompanied by some degree of risk, he argues, there is no obligation to be vaccinated in order to preserve others from harm. Rabbi Kleinman stops short of declaring that such risk of self-endangerment is prohibited; rather, he rules that it is discretionary.

In this writer's opinion that argument fails for two reasons. As has been stated, assuming that a presently healthy individual is under no obligation to assume the risk associated with inoculation, he nevertheless has no right to subject others to possible harm. Consequently, the assertion that, absent a *holeh le-faneinu*, there is no obligation to immunize one's children against measles is unwarranted. Arguably, one may accept danger for oneself, or perhaps even for one's own wards, but that does not entail an accompanying license to compel others to accept that risk as well.²⁹

28 Rabbi Kleinman claims that the frequency of death even during the measles epidemic was much less than one in a thousand afflicted. Nevertheless, if, the earlier developed distinction between an already existing danger and the potential of future danger is accepted (see *supra*, note 7 and accompanying text), that observation is moot. If the statistical assessment of "one in a thousand" is relevant only with regard to preventing a future danger the "one in a thousand" standard is not applicable during a time of contagion since even a lesser risk would constitute a present "danger."

29 See R. Chaim Pelaggi, *Nishmat Kol Hai, Hoshen Mishpat*, no. 49.

In addition, the ruling restricting performance of autopsies for purposes of preserving life to instances in which there is an actual, physical *holeh le-faneinu* has been rejected by an overwhelming consensus of rabbinic authorities. As has been shown, the concept of *holeh le-faneinu* is not to be understood in a literal sense.

R. Israel Salanter's celebrated ruling regarding eating on *Yom Kippur* during a cholera epidemic was issued despite the fact that the epidemic had as yet not reached the environs of Vilna. A nurse accompanying a patient being transported to a hospital on *Shabbat* may return to her outlying settlement if there is a "one in a thousand chance" that her services will be needed in tending to another, seriously ill patient during the course of that Sabbath. R. Isser Yehudah Unterman permitted soldiers entering into combat on the Sabbath day to carry with them materials needed for erecting a field hospital on *Shabbat* even before a single casualty had occurred. He further permitted transporting those materials even before a single shot had been fired.³⁰ In such instances there is no *holeh le-faneinu* in a literal sense of the term. Upon commencement of hostilities, there may not yet be even a single casualty, but there is a true danger "before us" in the form of actual warfare. However, in the case of preparing construction materials for a field hospital before a single shot has been fired, there is no actual danger. The only thing that is present is the decision to embark upon hostilities, i.e., it is only the determination to generate a future danger, or a *sibbat ha-sakkanah* – a cause of the danger, rather than an actual danger. That determination in itself must be classified as tantamount to a *holeh le-faneinu*. At the time those actions are contemplated, the danger lies in the future but is entirely nonexistent in the present. Yet, for purposes of Halakhah, statistical probability of an impending danger renders the danger as if it were already present. Consequently, given the likelihood of contagion, both the father and the school must regard an unvaccinated child as already afflicted by measles. The treatment, of course, is vaccination.³¹

VI. Vaccination as a *Milhemet Mizvah*

There is an additional, novel, consideration that would render inoculation mandatory. The underlying concept is formulated with regard to an entirely disparate matter. Halakhah requires only utilization of a *refu'ah bedukah*, i.e., a therapeutic measure whose efficacy has been tried and tested. There is no requirement to make use of a *refu'ah she-einah bedukah*, i.e., a

30 See R. Isser Yehudah Unterman, *Torah she-be'al Peh*, XI (5729), 14.

31 For further discussion of the category of *holeh le-faneinu* see J. David Bleich, "AIDS: Jewish Concerns," *Bioethical Dilemmas*, I (Hoboken, N.J., 1998), 153–156 and *Contemporary Halakhic Problems*, VIII, 271–278.

completely untried, experimental medication.³² Employment of a *refu'ah she-einah bedukah* may not only be unnecessary, but actually forbidden, as being beyond the ambit of remedies for which the Torah gave license by inclusion in the verse “and he shall surely heal” (Exodus 29:19).³³

R. Jacob Reischer, *Teshuvot Shevut Ya'akov*, II, no.84, discusses a curious question. May funds earmarked for *pidyon shevuyim*, i.e., ransom of captives, be diverted and used in caring for people during the course of an epidemic? *Pidyon shevuyim* is the highest form of charity superseding even other forms of *pikuaḥ nefesh*. Rashi, *Bava Batra* 8a, explains that captivity is harsher and more onerous than other forms of danger because the captor “has the power to do as he wishes with [the captive], whether death or starvation.”

A plague raged through Europe during the years 1709 to 1713. *Shevut Ya'akov* describes the epidemic of 1713 as different from other epidemics in that Jews were not able to render assistance to one another, the walls of the ghetto were hermetically sealed³⁴ and only with the greatest difficulty was it possible to secure permission to bring food to the inhabitants. In some places Jews were forced to hide in forests and caves. Jews who found themselves on roads or in fields were exposed to death. *Shevut Ya'akov* finds that this application of well-founded fear of death was even more onerous than usual captivity. Accordingly, *Shevut Ya'akov* rules that funds dedicated to *pidyon shevuyim* may be directed to ameliorate the plight of victims of an epidemic.³⁵

R. Shlomoh Zalman Auerbach makes an even stronger point in categorizing measures taken to alleviate an epidemic as a *milḥemet miṣvah*. Halakhah generally disparages use of “unexamined cures” (*refu'ah she-einah bedukah*). Nevertheless, in his *Minḥat Shlomoh*, II, no. 82, sec. 12. Rabbi Auerbach rules that, during epidemics, even “experimental” medical

32 For a fuller discussion see J. David Bleich, “Maimonides on the Distinction between Science and Pseudoscience,” *The Philosophical Quest: Of Philosophy, Ethics, Law and Halakhah* (Jerusalem, 2013), pp. 253–272.

33 See R. Moshe Feinstein, *Iggerot Mosheh, Even ha-Ezer*, IV, no. 10. See also J. David Bleich, “*Iyyunim be-Hilkhot Refuah ve-Sakkanah*,” *Tiferet Eirovah*, no. 2 (5764), pp. 25–35.

34 Although *Shevut Ya'akov* rules that funds dedicated to ransoming captives may be used to ameliorate the plight of persons quarantined during an epidemic he stops short of saying that quarantine alone constitutes “captivity.” Nevertheless, that phenomenon was clearly a factor in reaching his decision. Cf., Jesse Lempel, “*Pidyon Shevuyim and the Pandemic*,” *The Lehrhaus*, June 12, 2020.

35 Cf., R. Shimon ben Zemaḥ Duran, *Tashbaz*, II, no. 293, who seems to equate extreme deprivation and violence with captivity. Cf., also *Bet Lehem Yehudah, Yoreh De'ah* 252:1, who, in describing the same epidemic, observes that death, hunger and the sword were present and “that is certainly tantamount to captivity which includes all of these.”

procedures should be employed. In support of that position, *Minḥat Shlomoh* formulates a curious analogy. In requiring self-endangerment in pursuit of a “commanded war” considerations of *pikuaḥ nefesh* are ignored.³⁶ Rabbi Auerbach asserts that, similarly, self-endangerment is not grounds for failing to respond during an epidemic. War by its very nature entails endangerment of combatants. Similarly, statistical probability of loss of life in defending against wild animals should not be a determining factor because defense against wild beasts is analogous to a defensive war. Eradication of an epidemic, implies Rabbi Auerbach, is in its essence a “war” against subvisual creatures and has the status of a “commanded war” in which usual concern for individual life is to be set aside.³⁷

Similarly, asserts *Minḥat Shlomoh*, even a *refu'ah she-einah bedukah* may be employed in combatting an epidemic. A war of defense against human aggressors is a *milḥemet mizvah*, a commanded war, and is obligatory. Such warfare requires neither the sanction of a king, the acquiescence of a *sanhedrin*, nor consultation with the *urim ve-tumim* (the breastplate of the high priest). A *milḥemet mizvah* is a war against human aggression. But surely, contends *Minḥat Shlomoh*, a confrontation with a band of marauding wild animals is also a defensive war.

For the same reason, defense against the subvisual organisms causing disease is mandated as a “commanded war” and not contingent upon license to practice medicine conferred by the biblical dispensation “and he shall surely heal.” Such dispensation is required because otherwise human intervention would be perceived as “thwarting the decree of the King.”³⁸ Consequently, unlike other forms of healing, license to eliminate pathogens is not limited to modalities of conventional medicine. Immunization against contagious disease becomes not simply a prophylactic form of medicine but a defensive war “to deliver Israel from the oppressor.”

36 See *Minḥat Hinnukh*, no. 425; R. Naphtali Tzvi Judah Berlin, *Ha'amek Davar*, Genesis 9:5; and R. Abraham Isaac Kook, *Mishpat Kohen*, no. 143.

37 Rabbi Auerbach's point is particularly cogent in light of his own ruling, *Minḥat Shlomoh, Tinyana*, no. 100, sec. 7. The general rule is that Halakhah takes no cognizance of subclinical phenomena. Nevertheless, Rabbi Auerbach maintains that Halakhah does recognize subclinical entities that are subject to manipulation (*metappelin bo*). If so, the comparison of pathogens to wild animals is apt.

For further discussion, see *Contemporary Halakhic Problems*, VII (Jerusalem, 2016), 62–64.

38 See *Tosafot, Bava Kamma* 85a, s.v. *she-ne'emar*. See also Rashba, *ad locum*, whose comment may be paraphrased as “If God afflicts, how can man presumptuously heal?”

Unfortunately, defensive war is accompanied by casualties. There is no gainsaying the fact that vaccines, as do all medications, carry the possibility of side effects, including some rare but serious ones. Yet, decades of scientific study confirm that the benefits far outweigh the risks. According to a recent report from the Centers for Disease Control and Prevention, in the last thirty years alone, childhood vaccines have prevented more than 500 million cases of disease, 32 million hospitalizations and more than one million deaths in the United States. Those figures do not include the incalculable number of lives that have been saved and hospital stays that have been avoided by the total eradication of smallpox and virtual eradication of polio.³⁹

39 Fangjun Zhou, Tara C. Jatlaoui, Andrew J. Leidner, *et al.*, “Health and Economic Benefits of Routine Childhood Immunizations in the Era of the Vaccines for Children Program — United States, 1994–2023,” *Morbidity and Mortality Weekly Report.*, August 8, 2024, vol. 73, no. 31, pp. 682–685.