

State of Iowa
Board of Pharmacy Examiners

1209 East Court Avenue, Executive Hills West, Des Moines, Iowa 50319-0187
Telephone: (515) 281-5944 Facsimile: (515) 281-4609

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March 10, 1995

Senator Elaine Szymoniak
The Iowa Senate
Statehouse
LOCAL

Dear Senator Szymoniak:

I am again writing in response to your letter dated February 23, 1995, concerning the medicinal use of marijuana. Board members and staff have conducted an extensive review of the medical literature pertaining to medical marijuana, including American, British, and Australian sources. Our search included all of the references listed at the end of this letter. The Board believes that the pertinent medical literature supports its opposition to marijuana for therapeutic purposes and offers the following information for your review:

1. "...[T]he essence of arguments on both sides revolves around how much research is enough...despite published studies, very little still is known about the extent of marijuana's physiological and psychoactive effects."¹

2. Janet D. Lapey, M.D., the executive director of Concerned Citizens for Drug Prevention, Inc., is one of medicinal marijuana's most vocal opponents. Dr. Lapey has stated that "crude marijuana contains some 400 chemicals, many unidentified, that, when smoked, combust into more than 2,000 chemicals, including carcinogens and toxins such as benzene and toluene."¹ Cannabis has also been described by C. H. Ashton as "a prime example of a pharmacologically 'dirty' drug. It contains many active substances with multiple effects and several (unknown) mechanisms of action."²¹

3. Dr. Lapey has also stated that the National Institutes of Health reports that "new drugs, including the serotonin receptor antagonist ondansetron hydrochloride (Zofran...), surpass THC's therapeutic value in calming cancer patients' chemotherapy-induced nausea. For HIV wasting syndrome, she points to the availability of dronabinol, noting the potential dangers of immunocompromised patients smoking a carcinogen-containing substance."¹
4. Christine Hartel, Ph.D., the associate director for neuroscience in the Division of Clinical Research at the National Institute on Drug Abuse (NIDA), reinforces Dr. Lapey's remarks. Dr. Hartel has stated "that after 20 years of research that produced synthetic THC in dronabinol capsules, 'the doctors and researchers at the NIH do not see [inhaled] marijuana as having much promise'."¹
5. One recent article published in The Western Journal of Medicine has stated the following: "Marijuana smoke contains carcinogens and more tar than tobacco smoke, and the psychoactive effects of marijuana ingestion have been implicated as a risk factor for injuries...daily marijuana smoking appears to be associated with respiratory conditions even among persons who never smoked tobacco."² The study also found "increased risks of injury-related and other (nonrespiratory, noninjury) outpatient visits among marijuana smokers, suggesting that marijuana use may have *many* adverse health effects" (emphasis added).² The authors concluded that "[D]aily marijuana smoking, even in the absence of tobacco, appeared to be associated with an elevated risk of health care use for various health problems."²
6. Donald P. Tashkin, M.D., a professor of medicine at the University of California School of Medicine in Los Angeles, has stated that "[s]everal lines of evidence suggest that marijuana smoking is also associated with an increased risk for the development of respiratory tract malignancy."³
7. Although the use of cannabis for medical purposes has been legalized in Canberra, Australia, it remains highly controversial. The Australian federal health minister, the Australian Medical Association, and the Australian federal police are all pressuring lawmakers to repeal the new law. The Australian Federal Attorney General has called on the members who passed the law to "move quickly to repeal the amendments and repair the damage done to the territory's reputation for responsible law making."⁴
8. Richard H. Schwartz, M.D., of the Fairfax Hospital for Children in Falls Church, Virginia, has stated that "support of the use of marijuana for medical purposes is scientifically unfounded. There is no evidence that marijuana is superior to ondansetron (Zofran), dexamethasone, or synthetic tetrahydrocannabinol (Marinol) as an antiemetic in patients undergoing chemotherapy. Nor is there scientific evidence to support the use of marijuana for AIDS-associated anorexia, depression, epilepsy, narrow-angle glaucoma, or spasticity associated with multiple sclerosis. As a crude drug, moreover, marijuana has been shown to produce undesirable mental changes, disturbances in coordination, giddiness, and hypotension in at least 25 percent of novice users..."⁶

9. Doris H. Milman, M.D., of the Children's Medical Center of Brooklyn (New York) has stated that "[m]arijuana cannot be characterized as 'a remarkably safe substance.' Its active ingredient, tetrahydrocannabinol, may have some therapeutic value as an antiemetic but has not been generally accepted thus far, because there are other, more useful, such drugs and because its other applications are far from established."⁶

10. An Australian article published in 1992 concluded that "the results of standard in-vitro and in-vivo toxicological tests performed in the 1970s on animal preparations to which marijuana extracts were administered have proved to be good predictors of the long-term pathophysiological manifestations observed 20 years later in chronic marijuana smokers. These manifestations also confirm anecdotal accounts reported throughout history of the damaging effects of cannabis."⁷

11. Amanda Caswell, another Australian author, has warned that "smoking is not an ideal method of drug delivery and chronic marijuana smoking has been associated with bronchitis and asthma."⁸

12. Several authorities have criticized the survey of oncologists conducted by Richard E. Doblin and Mark A. R. Kleiman. In their survey, Doblin and Kleiman stated the following: "Of the respondents who expressed an opinion, a majority (54%) thought marijuana should be available by prescription."¹² In response, Richard H. Schwartz, M.D., has stated the following: "I calculate that this 'majority' can be no more than 15% to 20% of the original sample and is probably much less."⁹ Sandra S. Bennett of the Oregon Federation of Parents for Drug Free Youth stated the following in a letter to the editors of the *Annals of Internal Medicine*: "

I want...to point out that, although the authors [Doblin and Kleiman] stated their association with the John F. Kennedy School of Government of Harvard University, they failed to mention that Mr. Doblin is the founder and president of the Multidisciplinary Association for Psychedelic Studies (MAPS), referred to as the 'People's Psychedelic Pharmaceutical Company' in their newsletter head. The organization has advocated research on humans with the street drug Ecstasy and the gradual medicalization and legalization of psychedelics.

In MAPS newsletters dated Summer 1990 and August 1991, Doblin outlines a plan to use different forums, including *Annals* and the press, to lend credibility to the campaign to legalize marijuana use and to bolster a suit against the Drug Enforcement Administration. I believe that the authors' bias and hidden agenda should be made known to your readers.⁹

13. Stuart M. Levitz, M.D., of the Boston University School of Medicine, has warned that "[p]atients should be aware that this practice [of smoking marijuana] may involve unforeseen risks. Studies have shown that most illegally obtained marijuana is contaminated with *Aspergillus* species...*Aspergillus* spores easily pass through

contaminated marijuana that is smoked...in immunocompromised patients, invasive pulmonary aspergillosis may ensue.¹¹

14. Rayford Kytle, the spokesperson for the United States Public Health Service, reports that scientists at the National Institutes of Health (NIH) have concluded that existing medical evidence does not support continuation of the policy that has allowed a small number of cancer, glaucoma, and AIDS patients to smoke marijuana legally. "NIH scientists believe that there are better and safer treatments than smoked marijuana for controlling chemotherapy-induced nausea, relieving eye pressure caused by glaucoma, and stimulating the appetites of patients with HIV-wasting syndrome," Kytle has said.¹⁰

15. J. Thomas Ungerleider, M.D., of the UCLA Center for the Health Sciences, Department of Psychiatry, has stated the following:

A special problem that arises when cannabis or THC is researched is the positive and negative bias about the drug that the subject or patient brings to the study. Since it is believed that marijuana effects are readily identified, then even in a blind study certain patients might detect it, attribute magical powers to the drug, and overreport its beneficial impact. In the large cancer chemotherapy study recently completed at UCLA, it was found that 75% of the patients were unable to distinguish when they received THC and when they received Compazine...

One thing is clear: Marijuana is neither the wonder drug that some people have assumed it is, nor the embodiment of evil that others assume. If it finally gains some position in the medical armamentarium, it will likely be a modest one, providing symptomatic rather than curative relief.¹⁴

16. The possible adverse effects of cannabis on health include the following: impaired immunity; chromosomal damage; psychopathology (including acute panic reaction, toxic delirium, acute paranoid states, psychoses, flashbacks, violence, amotivational syndrome, residual psychomotor impairment, and brain damage); tolerance and dependence; lung problems; cardiovascular problems; eye problems; and effects on driving an automobile.¹⁵

17. Harry S. Greenberg, M.D., and others recently studied the effects of smoking marijuana on patients with multiple sclerosis. "The hypothesis of this study was that marijuana smoking would relieve the spasticity of patients with multiple sclerosis (MS) sufficiently to allow better postural control and thus produce a therapeutic benefit...Marijuana smoking worsened the dynamic posturography of both the patients and the control subjects. Therefore the hypothesis that initiated this research was not confirmed" (emphasis added).¹⁶

18. According to a study on the management of cancer pain in adults published in the American Journal of Hospital Pharmacy in 1994, cannabinoids are not recommended for the treatment of cancer pain due to adverse effects such as dysphoria, drowsiness, hypotension, and bradycardia.¹⁷

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19. "Despite initial hopes...the therapeutic use of cannabinoids remains limited."²¹

20. Robert E. Peterson, director of Michigan's Office of Drug Control Policy, has stated that "there's no...support from the medical community when it comes to lifting the medicinal marijuana ban."¹ He and other opponents also say that medicalized marijuana is a smoke screen. "The only reason we're having the medical debate is because [advocates] want it legalized for recreational use."¹

21. Lester Grinspoon, M.D., a leading advocate of marijuana's medicinal value, admits that a meaningful marijuana compassionate use program would require "an army of bureaucrats..."¹

In summary, the Board wishes to emphasize the following:

- ◆ The survey of oncologists conducted by Richard E. Doblin and Mark A. R. Kleiman in 1990 has been questioned and criticized by medical practitioners and others. The findings of the survey may be inaccurate and flawed. As a result, we do not believe that the survey should be relied upon.

- ◆ In regard to research, good data is lacking to prove the therapeutic effectiveness of smoking marijuana. While the Board does not oppose research, we believe that it will be difficult for any researcher to obtain unbiased data.

- ◆ Chemotherapy-induced nausea and vomiting is a very weak excuse for justifying marijuana use. New drugs, such as ondansetron hydrochloride (Zofran), work very well to control nausea and vomiting in cancer patients.

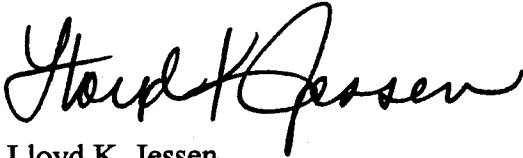
- ◆ Allowing AIDS or cancer patients who are already immunocompromised to inhale marijuana smoke only exposes them to additional health risks (bacterial infection, lung cancer, etc.).

- ◆ The purity and consistency of the marijuana product is a significant factor. The dose of active ingredient administered from inhalation by smoking cannot be controlled.

- ◆ The offices of the Iowa Board of Pharmacy Examiners are clerical offices. The Board has no resources or laboratory facilities available to it which would allow bench research or scientific extrapolation of marijuana products to test for purity or quality. The statement in your letter of February 23, 1995, that "any marijuana received [by the board]...shall be made free of impurities and analyzed for potency by the board" is not possible due to the limitations of the Board's current facilities and level of funding.

Thank you for understanding the cautious attitude of the Board in regard to this issue. When regulating the practice of pharmacy, the Board always strives to take whatever action is necessary to adequately promote, preserve, and protect the public health, safety, and welfare.

Sincerely yours,

A handwritten signature in black ink, appearing to read "Lloyd K. Jessen". The signature is written in a cursive, flowing style.

Lloyd K. Jessen
Executive Secretary/Director
IOWA BOARD OF PHARMACY EXAMINERS

cc: Mark Schoeberl
Legislative Liason
Iowa Department of Public Health

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