MAPS

Bulletin of the Multidisciplinary Association for Psychedelic Studies

CELEBRATION IS IN ORDER. MAPS has leveraged an investment of $10,000 and considerable staff time over the last five and a half years into almost $1 million for medical marijuana research. The $978,000 grant from the National Institute on Drug Abuse (NIDA) to Dr. Donald Abrams, UC San Francisco, will pay for all the expenses of the first Food and Drug Adminstration (FDA)-approved research into a medical use of marijuana in a patient population in fifteen years. Dr. Abrams' study will focus on the use of smoked marijuana, the oral THC pill (Marinol) and a placebo in AIDS patients receiving the protease inhibitor, Indinavir. MAPS provided $10,000 to Dr. Abrams and his team to cover costs associated with protocol design and grant applications. A detailed protocol as well as a history of the struggle to initiate medical marijuana research can be found on the MAPS web site at www.maps.org/mmj.

Letter from Rick Doblin, MAPS President

From an economic perspective, Dr. Abrams' $978,000 grant exceeds all that MAPS has spent in its entire history. The total amount of money that MAPS has expended for all purposes from its founding in 1986 to the conclusion of its latest fiscal year (see annual report on p. 11) is about $925,000. From a political perspective, the success of Dr. Abrams' initiation of medical marijuana research is similar to the success MAPS achieved in working with Dr. Charles Grob, Harbor-UCLA Medical Center, to initiate the first FDA-approved human study with MDMA. MAPS worked to catalyze MDMA research for six and half years, from early 1986 to November 1992, when the FDA finally approved Dr. Grob's Phase 1 MDMA safety study. The FDA had previously rejected all four other MDMA research proposals that had been submitted since 1985, when MDMA was placed in Schedule 1.

Though celebration is in order, it must be tempered by acknowledgement of the difficulty of further progress. Dr. Abrams' initial safety study will take two years to complete. If the data suggests that marijuana can be safely administered to AIDS patients, at least three years for additional studies will be required before it may be possible to submit data to the FDA requesting that marijuana be made a prescription drug. Also problematic, on November 3, Dr. Ethan Russo, U. of Montana, learned of the rejection of his MAPS-supported NIH grant application to study marijuana in the treatment of migraine headaches. Dr. Russo and MAPS fully intend to continue working together to seek approval for his protocol, inspired by the precedent set by Dr. Abrams, whose first grant application was also rejected. Dr. Russo is, as far as I know, the only physician other than Dr. Abrams trying to obtain permission to conduct medical marijuana research in a patient population.

Another cause for celebration is that the first book published by MAPS, *The Secret Chief*, by Myron Stolaroff with contributions by Albert Hofmann, Stan Grof, and Sasha and Ann Shulgin, is now available (see page 29). *The Secret Chief* has been a labor of love by all concerned. We are especially proud to offer a unique hardcover collector's edition of 100 numbered copies signed by Myron Stolaroff, Albert Hofmann, Stan Grof, and Sasha and Ann Shulgin. These copies are for sale for $250 each, with 100% of the proceeds devoted to psychedelic psychotherapy research.

Through their support of MAPS, its members have played an essential role in MAPS' success. With your continued support, the possibilities are inspiring to consider, even though the rate of progress is likely to be frustratingly character building.
Best wishes for the holidays.—Rick Doblin

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ISSN 1080-8981

Native American Church Peyotism and the Treatment of Alcoholism

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THE ALMOST THIRTY YEAR FREEZE on research into the beneficial uses of psychedelics is slowly starting to thaw. Human subject studies have been approved by the FDA for Phase 1 safety studies of ibogaine (a derivative of a West African plant *iboga*) which may turn out to be an important new treatment for heroine and cocaine addiction. Ketamine (a general anesthetic, which at sub-anesthetic doses facilitates altered states of consciousness), has been shown to facilitate abstinence from alcohol in chronic alcoholics (Krupitsky 1992, 1997). Research is now underway in Peru to study *ayahuasca*, a mixture of two Amazonian plants that may also be of use in the treatment of addictions.

From time immemorial, indigenous peoples have used mind-altering plants to facilitate spiritual growth and healing. Early petroglyphs in Northern Africa indicate mushroom rituals (circa 12,000 B.C.) and early Indian Vedic texts mention *soma*, a mind altering substance, also believed to be a mushroom.

In the Northern American Continent the use of mushrooms dates back before written history as well as the use of the peyote cactus (*Lophophora williamsii*). Indigenous peoples as far back as 6,000 years ago probably used peyote. That's when we find the first traces of man in the deserts of Mexico. Peyote's use can be traced from central Mexico to the Southern areas of Texas in the 1800s. By the end of the 1800s the ritual use of this cactus had spread to the central parts of the United States and started to be used widely as a pan-Native American religion. Today the Native American Church of North America is the largest pan-Native American religion in North America. Its ceremony is rooted in the native concept of holistic health and harmony with nature. The use of peyote in a structured religious setting, with the guidance of a socially sanctioned healer, has been reported by some authors to be a powerful treatment for alcoholism among Native Americans and a way of bringing balance back into the lives of its participants.

Unfortunately, to date there have not been any controlled studies of the use of peyote in this setting to treat alcoholism or other addiction disorders. Most of the literature has consisted of anecdotal accounts of its effectiveness (Albaugh & Anderson,1974; Bergman, 1971; Pascarosa, & Futterman, 1976; Pascarosa, Futterman & Halsweig, 1976). The closest research that has been done in this area is with LSD back in the 50s and 60s. Virtually all double-blind controlled studies that have been done with LSD in the treatment of alcoholism have met mixed reviews by the scientific community. There has been short term or "afterglow" improvement in patients which diminishes with time (Halpern, 1996). It is important to note that most of these studies only measured drug effect with no appropriate clinical direction and support. (Smart & Strom, 1964; Hollister et al., 1969; Ludwig et al., 1969; Mottin, 1973).

The Native American Church, on the other hand, offers a combination of elements that used in conjunction with one another, form the basis of a holistic treatment model that takes the entire individual into account. Peyote is seen as a medicine by the native peoples who use it. They believe that the controlled religious use of

this medicine will allow them to see the truth about their lives and that the peyote spirit is able to give them guidance and direction. If you sit quietly and still the mind the voice of the spirit will come through and give you guidance. If the insights that you receive are not immediately apparent there are elders and spiritual leaders who can interpret such matters. Peyote is another one of the herb medicines in the Native American pharmacopoeia. It is viewed as a healing agent and a psychic integrator. It has the ability to integrate mind, body, spirit, and emotion in a safe, socially sanctioned, religious setting.

The main elements of the ceremony have been variously described as the master or guide, the ritual group session and the psychotropic drug. Through the use of these elements, heightened susceptibility to suggestion, cathartic expression and managed states of consciousness can be achieved. This in turn leads to the lowering of defense mechanisms and the breaking down of denial systems, which is a major component of any treatment for substance abuse.

There has been some mention made in the literature of the pharmacological addiction-blocking effect of peyote. In a 1977 article in *Clinical Toxicology*, Dr. Kenneth Blum lays out a possible rationale for the addiction-blocking qualities of peyote. His assumption is that certain metabolites of peyote (isoquinolines) are identical to the metabolites produced by heroin and alcohol. DR. Blum did some of the pioneering work into the connection between opiate addiction and late stage alcoholism. He has said that his exploration into this area was left hanging with the loss of research funding for all such projects in the late 70s. He believes there is a connection between peyote and its use as an addictive blocking treatment for alcoholism but also admits that more work needs to be done (Personal Conversation, 1996; Blum, Futterman, & Pascarosa, 1977).

The debate over the mechanism for alcoholism has gone back and forth within the scientific community. Isoquinolines and endorphins have been the two main substances studied over the past twenty years, with a recent growing interest in a dopamine connection. The question is divided and research into the pharmacological effects of peyote is sorely lacking.

Here in Arizona, the Peyote Foundation, with the cooperation of the Multidisciplinary Association for Psychedelic Studies (MAPS), local Native American Church leaders and myself are planning a study to measure the effect of Native American Church peyotism on alcohol abuse. The details of the patient recruitment and exact research design are in the planning stages now. This would be the first controlled study of the effects of Native American Church Peyotism on alcohol abuse: a first step in affirming or denying the many anecdotal reports of sobriety achieved through participation in the Church.•

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TRADITIONAL REHABILITATIVE THERAPY:

A look into the positive therapeutic potential of the Native American Church peyote ceremony

Leo Mercado, Peyote Foundation

IMAGINE THIS; a fireside therapeutic setting, a glowing tipi in the starry Sonoran Desert night. The sweetness of cedar smoke fills the air with a palpable sense of something beyond, something sacred. Tobacco and sagebrush also present themselves to the senses, earnestly venerated as they hold their proper places among the cardinal elements of fire, water, earth, and sky. The Holy Psychedelic Sacrament is passed among the participants who encircle the fire, each person taking as needed to help in this night of physical, emotional, and spiritual healing. Attended by sincere and attentive friends and relatives, and colored with heartfelt song and ceremony, verbal expressions of one's state of heart touches every person present throughout the night, as well as into the following day and beyond. This is the flavor of what occurs in the Native American Church tipi each weekend throughout the United States and Canada.

The benevolent effect of the peyote religion among Native Americans has been documented from the very inception of the Native American Church. It is very common, when attending a peyote ceremony, to hear testimonial accounts of various physical and emotional maladies being lifted by the healing power of these rituals. Peyote meetings are often "put up" for those in need of healing from drug and alcohol addiction, frequently with great

success. These ceremonies and their beneficial effects have not been limited to tribal or reservation use, but have become increasingly common among people of diverse ethnic backgrounds. This passive evangelization has occurred partly through generations of inter-marriage, and by the very need of traditional faith and therapy among extended family members and friends. Despite the cosmopolitan nature of the approximately 300,000 member church, most people are reminded of this valuable healing tradition only by the occasional news story involving a legal revision, an arrest, or other non-therapeutic/spiritual question regarding peyote. Though our society might dismiss psychedelic healing ceremonies as a foreign or archaic concept at best, these traditional ways continue to provide deep therapeutic experiences for many people in locations that are often not distant from urban America.

The peyote ritual, and the life that accompanies it, is often described as a "hard road." It is certainly not for everybody, as real commitments are required, even in the need to devote oneself to the demanding physical task of sitting attentively for a twelve hour ceremonial session which involves ingesting a decidedly unpalatable sacramental substance. Following through on the insights provided is yet another matter, demanding earnest effort on the individual's part. Yet those who do feel drawn to improve themselves through this opportunity may also infuse positive change into the world around them. It is the hope and prayer of many of us who share these ways, that sincere people may continue to benefit from this traditional form of sacred therapy.

One strong factor in the success of the Native American Church is the support group of fellow participants which goes along with each ceremony. The depth of shared worship, problems prayed for, solutions offered, old pain relinquished, and self-worth retrieved, can affect highly charged bonds among communicants. New friends and relations are emotionally established by the very act of participating actively in each other's therapy and sacred ritual. It is quite common to take on "adopted" parents, uncles, brothers, sisters, and nephews over a period of time. This Native American Church family becomes closely intertwined in the realities of each other's daily lives, as well as in the sharing of their shortcomings, their hopes, and their dreams. This extended family exists as an ongoing support system, oftentimes more present and consistent than even blood-relations who do not participate in the spiritual unfolding which occurs under the tipi canvas.

The very tangible regenerative effects of this "traditional peyote therapy" have recently been aided and secured for the future by the members and staff of MAPS, the members of The Peyote Foundation, and the officers and members of the Native American Church. A special research assistance fund from MAPS has provided The Peyote Foundation with a beautiful Native American Church tipi, crafted by Lee Grey, a Navajo Road Man (peyote minister). A dedication meeting was held to commemorate it on Father's Day on June 14-15, 1997. This has helped literally open the sacred door to people in need, who might not formerly have had access to the blessings and therapeutic possibilities of the Peyote Ceremony. This dedicated traditional structure will provide a neutral zone for future research into the potential long-term effects of ritualized peyote use by people suffering from alcoholism and substance abuse. Previously, published reports indicating noticeably positive indications of this potential were mostly ethnographical in nature, some anecdotal, none with long-term follow up of participants or standard control methods. We are in preparation for a formal study regarding clinically diagnosed sufferers of alcoholism who participate in a series of Native American Church ceremonies, as compared to a matched group who do not participate in the peyote therapy. This study will be overseen and conducted by John McClusky, M.S.W. of Arizona State University. (see page 3).

Already the Peyote Foundation tipi is providing for ongoing services of various chapters of the Native American Church and the members of the Peyote Foundation. Recently, a Native American Church group in El Paso, Texas asked for our assistance and was provided with transport and use of the Foundation tipi in a ceremony held in a state park outside of the city. We also were able to provide the tipi for a meeting held on a local reservation. This event was sponsored by the family of a young man who was in need of prayer, support, and counseling because of problems with substance abuse. The results of this and other similar situations have been very positive.

A full schedule of Native American Church services is now being conducted under the comforting and majestic shelter of the new tipi at the facilities of The Peyote Foundation in Southern Arizona. Many of these ceremonies directly involve the need for new insight into addictive physical and emotional patterns of behavior. Meaningful reflection into the nature, meaning, and purpose of our lives are richly given with the wonderful entheogenic guidance of the ancient and wise peyote sacrament, and the supportive atmosphere of helpful and experienced people. Throughout the course of the night, each person in attendance becomes an important part of the therapeutic ceremony, a friendly counselor, learning their own strengths and weaknesses as they go, while at the same time offering encouragement to those whose problems we can constructively empathize with. As the morning sun rises into the tipi door, we all leave the sacred circle, bless ourselves in the radiant sunshine, and warmly welcome each of our friends and relations into the light of a new day.

The Peyote Foundation was initiated in 1996 with the goals of Education, Conservation, and Inspiration. As acting president and co-founder of this public service, conservatory, and religious organization, I offer my sincere thanks to MAPS, the members of The Peyote Foundation, and the members and officers of the Native American Church, without whose continuing assistance this work would remain only a hopeful vision of possibility. In the future, I will continue to report on the progress of this contemporary journey into traditional healing. •

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Speaking the silence: **MDMA** in a couple dealing with cancer

What follows are personal accounts of two MDMA sessions shared by a man with terminal cancer (age 25) and his girlfriend (age 28). It's anecdotal reports such as these that demonstrate the importance of initiating clinical trials into this use of MDMA. The MAPS-supported protocol to study the use of MDMA in the treatment of pain and distress in terminal cancer patients was submitted to the FDA in November 1997 by Dr. Charles Grob and Russell Poland, Ph.D., Harbor-UCLA Medical Center.

Sue's account

To summarize my life with a "terminal" cancer patient, I would use the term heart-wrenching. My boyfriend, Shane, was diagnosed in March of 1995 with renal cell cancer. Within three days of diagnosis, they took him in for removal of his right kidney, only to discover that there were innumerable nodules that had already spread to his lungs. We were only casually dating then, but as time wore on, I fell in love with him.

A month after his surgery, they began chemotherapy. Seven different chemo drugs rushed through his body for hours on end. Chemo is the worst *hell* ever created, and Shane would endure one week of every month for the next year in this hell. During his hospitalizations, his personality would completely change for the worse. Pushing me as far away as he possibly could, he made me endure emotionally the suffering that he was also going through. Much to his dismay, I wasn't easily dissuaded. Love does crazy things to your mind.

Chemo

During the final month of the chemotherapy, Shane's oncologist decided that it wasn't of any help, and gave him the option of not doing it, for which we were both grateful. I cannot emphasize enough the pain we were *both* going through with this. His was physical, and mine was mental. He would completely shut me out, and wouldn't talk of his condition with me. It hurt being unable to talk to the man I loved, and I learned to push his condition out of my mind.

After the chemotherapy, we discovered an experimental therapy of *Interferon* and *Accutane*. His doctor decided that he was a good candidate, and we began treatment. This involved taking pills daily that caused him to have to avoid going out in the sun, and shots that made him sick nightly. The pushing away began again. Shane went through terrible mood swings that intensely tested our relationship, and we almost didn't make it through. I kept asking myself "Is this *really* worth it?" During this entire time, we didn't discuss the cancer. The only time it was brought up was after he came home from a checkup and informed me that the nodules in his lungs were growing. I broke down, once again asking myself "Why am I doing this?"

He hasn't been on any treatment in about nine months, and since then, a new tumor has shown up. This one is where his kidney was removed, and all they can do is monitor him at this point. Our entire relationship has revolved around arguments and stress. I've always believed that the cancer played a big part in that, but never knew for sure... until recently.

A friend brings up the subject

A good friend of mine had been there for me through alot of this, and suggested that maybe the stress in the relationship had to do with his condition. But Shane would always deny that it bothered him. So I was led to believe that it was just poor compatibility. This friend of mine and I began talking of MDMA. He sent me literature; we talked of the potential benefits to "end-stage cancer patients." I was very reluctant to try something I had never heard of, but kept an open mind. The more questions I would ask, the more I would become curious as to whether it would benefit us. Finally, after months of asking every possible question about it, I asked my friend if he thought we would benefit from MDMA. He replied that it would possibly open us up to being able to talk about the issues we were avoiding. He never once pushed Shane and me in any way, shape or form, only guided us into what would be the best thing we have ever done together for our relationship. I agreed to try MDMA and received more information on how to achieve optimal results. When the evening came to have the experience, we cleared our schedules and minds and began what would be the rest of our lives together.

First session

With supplies on hand and a bit of nervousness, we took the recommended dosage of the MDMA (approximately 125 mg) and sat on the couch and waited. The lights were dimmed and we had soft music in the background. I was in a terribly good mood to begin with, and wasn't sure if I was feeling anything. But when the MDMA did begin to affect us, Shane and I moved closer to each other, and just held each other. It was a closeness I hadn't felt in a long time with him. As time wore on, we grew physically closer, and felt a need to touch.

It was in no way sexual, it was almost like a desire to be inside of each other. We talked of many things at this time, work issues, problems with neighbors... different things in our lives. I began to cry for some reason when I would look at him, and he knew what was on my mind. I wasn't ready to talk about such a painful thing, but I truly *did* want to see if it was possible to, like I had been told. The cancer talk had finally come, and we headed into it full speed.

The talk

I finally got the answer I had been seeking for over two years. With the most love I have ever felt, Shane told me that his reasoning behind pushing me as he has is indeed due to his condition. He never wanted for me to get involved with him in the first place, because I will be unable to keep him. ("Push her away, and when she loses me to this, it won't kill her inside...") He told that hurting me is his only fear. Shane had told me this before, but I would always block it out. Once again, "out of sight, out of mind."

But this was different. I *felt* what he was saying, and the tender look in his eyes told me that he would always be there with me. For the first time since this ordeal began, I finally believed that he wouldn't leave me on his own free will, and that his only fear was leaving me, not leaving life in general. He was raised not to fear death, and he isn't afraid to die. But knowing the impact that his death will have on me, it causes him to push me away and make me feel anger towards him. I found myself crying as he was telling me all of this, but for the first time, there was no pain. Just understanding of the feelings and emotions that he felt. Crying has always been emotionally and physically painful; this night, the tears flowed, and I could only feel more and more love towards him. I told him how I feared him leaving and wanted so badly for him not to ever go. He would just look down at me and caress my face, assuring me that he will always be inside of me, and will always be watching over me. It didn't hurt to hear this; if there is ever truly a time to feel your heart smile, I was there at that time. These were things that I had heard before, from both him or his mother, but this night, they finally made sense. I could listen to him without pain, as he was able to do with me. A subject that was previously taboo due to its painful nature was finally confronted with the ease and openness we needed. I had wanted for so long to talk about his cancer with him, but one of us would always get upset (me) or on the defense (him).

Aftereffects

Since doing this together, Shane and I have a whole new perspective and appreciation on things. We have talked much more easily, and felt an openness and closeness that is new and beautiful to us. I can't express how wonderful it was having that talk with him that night. Facing death is about the most painful situation anyone will ever encounter, and with pain comes fear and anger. These two emotions cause many different blocks in communication that make things worse for all involved. Taking these barriers away opens the people involved to more open and caring communication—which is what we experienced. Nobody will be able to predict the length of our future together, but at least we now can face whatever we are dealt as a team. The frequency of hugs, kisses and "I love you's" as a result of this, the openness and understanding... these are things that we have implemented into our everyday time together.

In my opinion, the end result of our doing the MDMA together, is it will bring a peace to our lives together, and to the pending death of our relationship. We won't part with fear and pushing away to make it not hurt as badly. And the greatest benefit I have found is that if the cancer wins this battle, I won't look back on the man that I love and remember so much emotional pain. I will have fond memories of sharing. I'm not in any way insinuating that this is taking away the pain of losing him, but it has brought a closeness to the time we *are* able to share. As our situation progresses, I will admit, I would like to do this again with him. As of now, Shane is not fearing death, but that may change, and having him share his thoughts and fears with me is something from which we would both benefit greatly.

Shane's account

I am a 25 year old male who was diagnosed with renal cell cancer 2 1/2 years ago. I have had my right kidney removed but have numerous nodules spread throughout my lungs and a recently discovered mass where they removed my kidney. I feel great, although I tire rather easily. I have minor aches and pains but to look at me, I look perfectly healthy and normal.

I have been dating a wonderful 28 year old woman, who has stood by me through everything that I have gone through, for about the same amount of time. She's been through all of the misery of chemo and experimental treatments right beside me. Temperamental, *but* loving and taking care of me. She had refused to

We were both able to talk about the cancer and how it affected us without the pain that was usually associated with such discussions.

discuss the whole cancer issue, and would just drop the subject when I would bring it up. She had walked out of my hospital room on a few occasions when we received bad news from my oncologist. I thought that she didn't care.

Our relationship since we met has been great, although strained, and occasional arguments have forced a distance between the two of us that have made it impossible to become truly close. Many times we discussed whether we would ever be truly happy together, whether or not it was truly worth it, this misery I was putting her through.

A friend of hers who was informed of our situation told us about the use of MDMA in therapy sessions and fully explained to us both how it was used in this setting and his own personal experiences with the drug. He also sent us an issue of MAPS that gave me further knowledge and increased our interest in seeking the benefits of MDMA. *Could* it help us?

The MDMA session

A quantity of MDMA was obtained and we made plans together to make time to sit and talk about the problems that we could not seem to get past. Each of us took the recommended dose of MDMA and we sat together on the couch with the radio playing softly and the lights dimmed. We started off talking of inane subjects, giving the drug time to take effect.

After about a half hour we both noticed an extreme calm and relaxation wash over us. We continued to discuss unimportant things but eventually the subject turned to the condition of my health and our relationship. We were both able to talk about the cancer and how it affected us without the pain that was usually associated with such discussions. I discovered that she had been scared to get close to me for fear of losing me. This had caused her to unconsciously push me away. I also was able to tell her that I had tried to push her away to save her the pain of my death if I could not beat this. I am not scared of dying and I consider the cancer as another obstacle in my life to overcome. What it is that bothers me is that I can not control the effect that my health and death has on other people.

We were both able to discuss these things in a totally relaxed and peaceful state without any pain or anxiousness. There were alot of tears on both ends as we talked about how it will be dealt with when and if I die from this, but there was no pain. I think I finally made her know that it hurt me more than anything to tear her apart by having this disease, and now I understand her moods and lack of closeness. These are things that we haven't been able to tell each other before. Either I get defensive and want to hide things from her to protect her, or she breaks down from the pain. This is our first real time ever confronting my cancer. I still hate having to put her through this, but it helps having finally talked about it after all of this time. It was to the point where I would hide my doctor appointments from her, and not tell her the whole truth of how they went when I would go, just so she wouldn't have to hurt any more. This won't happen any more, we are finally in this together.

Afterwards

Since that wonderful evening, both of us have enjoyed a new closeness that we never knew before. Cancer almost killed a terrific relationship, due to lack of communication. It caused us both to put barriers around ourselves to prevent pain and hurting each other. This has changed since we've been able to openly talk about it. As I said, we are much closer. The pain I feel of hurting her will never go away, but it's great to finally be able to feel each others' thoughts and emotions. I now know that her "moods" aren't because of hatred or anger towards me, they are anger and fear towards my condition. And now I can deal with them by making the time that we do have together all the better.

As my condition worsens, I would love to have the opportunity to experience this again so we can openly deal with it. One session changed our relationship for the better, it brought a new found closeness. I know that there will be strain on our relationship, and more pain in how we both feel as my time gets closer. I would love to be able to just sit and talk about this with her, but doing the MDMA helped us to discuss this without the pain so that we could deal with it more openly when *not* under the influence of it. As I said, my dying doesn't hurt me, I do not fear it. I am scared to death of killing her by dying.

Yes, in my opinion, this is about the most wonderful way I could have ever been able to save the rest of our lives together. I don't know when I will lose my fight, but at least now I have someone that is fighting with me, not running the other way out of fear.•

A second MDMA session: Sue speaks

I wrote before on the experience of taking MDMA with my boyfriend who is a terminal cancer patient, and what we feel the experience brought to us. Our first session was one of eye-

Sue

Since the first time doing MDMA, we have adapted many of the feelings we learned into our everyday lives,


Shane

...and haven't reverted back into the protective shells that we had around us.

opening proportions and brought up emotions and feelings that were previously foreign to us because we had closed up to each other as a direct result of the cancer. Since our first experience with MDMA, we have adapted many of the feelings we learned into our everyday lives, and haven't reverted back into the protective shells that we had around us. It taught us to open up to the feelings we had towards each other and to live each day fully and together, not fighting each other as we had been doing out of the fear of our pending loss of each other. Our time together has been fairly wonderful, minus a few minor arguments that are normal in everyday life.

Since our friend had sent us four doses to use, we picked another night to do MDMA again. We were expecting this time to be somewhat similar to the first experience. I talked in detail to a therapist knowledgeable about MDMA before doing it because I experienced alot of stomach upset and vomited at the "coming down" of the first experience. He suggested putting it in capsules to ingest and told me to expect it to hit us at a different time interval.

We once again picked a night when there were no children around and got our "setting" perfect, thinking that it would be like the first time. I was worried about how Shane had so many things on his mind the first time... but our knowledgeable friend assured me that we would be all right. Without the nervousness that I had felt the first time (I *thought* I knew what was going to hit us...) we took the capsules and waited. It was almost 45 minutes before we noticed any effect of the drug. I was slightly concerned about this, but not enough to call either of my "consultants."

Powerful but different

Once it hit, it started off with the same feelings as before, the need to be close to each other. We sat on the couch and just touched each other and felt the overpowering feeling of love. But then things changed. We both felt the need to move and decided to go for a walk. We ended up on the field at the end of our street and lay on the grass and watched the stars, in each others arms. Not talking. It was like we had no need to communicate, and that we already knew what the other felt inside. Before taking the MDMA, I had told the therapist and my friend about some upcoming decisions that Shane and I had to make concerning some things that Shane's oncologist had posed to us. These were things that I wanted to discuss during the MDMA session, while we were able to talk so freely. But for some reason, lying there, I felt no need. It was like I already knew the answers in his mind, as he did mine. We lay there, just holding each other, and I honestly felt like I was inside of him and could feel his emotions.

The issue

Shane's doctor had told us that there was a big possibility that a tumor was growing where they had removed his kidney, and that she thought the cancer had spread. She talked to us about the possibility of trying chemotherapy. I was afraid of telling Shane what I felt about it, for fear of altering his decisions on it. The decision is ultimately his, and I didn't want him to do as I wanted instead of following his own mind. These are some of the things that I wanted to talk to him about, but I couldn't bring myself to start the conversation. And it's not like I didn't think of it, it was right there in my mind. But when I would think of approaching the subject, I would then have this voice inside of me telling me, "No, don't bring it up, just lay here and feel this way, feel this good and this close."

Realization

I now realize in my heart, that no matter what we do, nothing is going to change the fact that he is going to die from cancer. Telling him that I want to keep him around no matter what the cost is just going to reduce the quality of life that we have left. I'm going to enjoy what we have. Shane is adamant that he doesn't want to go through any more treatments unless the doctors can tell him that things will get better, and my telling him that I want him to be with me forever would cause him to go through the hell of chemo just for me. I knew this all along, but couldn't admit it to myself. It's like that night, just lying there with him showed me what we *do* have ahead of us. Serenity and happiness is ours for the taking if we work together, and I think that deep in my mind, I knew this. I knew that life isn't about quantity but quality, and if I had been able to tell him the things on my mind that night, it would have reduced the quality left in order to give us a three percent chance at a bit more quantity. I am far from a quiet person, but that night, I couldn't for the life of me bring myself to tell him what I felt about treatments, and my own selfish desire to keep him forever.

Disappointment

We lay there for about an hour, just watching the stars, then got up and slowly

walked down the path of the field. We were just holding hands and walking at a snail's pace, but feeling closer then ever, closer than the previous time doing MDMA. But what we both found odd is that we never, throughout the course of the night, felt like talking or sharing. Everything we experienced was internal. It was almost like we were inside of each other, knowing what the other felt. I honestly felt that this whole journey was a "flop" because we confronted *nothing* concerning his cancer that night. But after giving it much though, yeah, the first time it was great that we *were* able to confront the main problem we had in our relationship—my fear of losing him. But this time brought us even closer.

Knowing what the other felt

We weren't able to share with words, but it went so much deeper than that this time. It was like every time I would think of something I wanted to talk about, I wouldn't bring it up because past discussions we have had gave me the answers and I already knew. They may have come late, but the answers came to me that night. We have talked about it since that night, and it's weird, because the way I was feeling is the same as Shane was. Just like the first experience. We both wanted to confront so much the first night and we did. This night was just about being there inside of each other. Shane told me that he also had issues he wanted to talk about, but he knew what I would say. We both felt like we could read each others minds and souls.

I told the therapist afterwards that I felt like I had let him down because me and Shane's story should be an example of MDMA as used in a cancer situation, and that we resolved nothing that night except feeling like we were inside of each other. He told me that we may have made more ground than I thought. I didn't believe him that next day, but now is a totally different story. Granted, we were able to get more out in the open and discuss more that first night, but the second time in essence was actually better, because our subconscious told us that we already had our answers and were dealing with things better than we had thought. I am still in a serious case of denial about losing the man that I love, but I'm able to deal with it so much better. I will never get over the pain I feel inside when I think of the day that the cancer wins, but I know that Shane and I *are* on the same level now. Having the opportunity to once again express my thoughts and feelings about the cancer, and instead just laying there enjoying what we *do* have, tells me that I'm stronger than I thought. We've confronted everything about it. There is nothing left except to ensure that the quality of life we have left together is the best we can possibly make it. If it weren't for the first night doing the MDMA, we wouldn't be where we are right now—the second night sealed what the first night had prepared us for.

Comparing the two sessions

Shane and I no longer feel anger towards each other. We *still* fall back on our first MDMA session together when one of us feels like we are closing down emotionally on the other. If you wanted my honest interpretation of the second MDMA experience, it is that we reached a level where it's a moot point discussing the cancer, and that we *are* indeed dealing with it to the best of our abilities. The pain is there, but I now feel that I can open up to Shane, and he no longer feels that he has to hide from me about it anymore. I was finally able to open up to him and let him know how I feel, and he respects my fears. The second night taught us that we already know what the other feels inside, and that we just need to do the best with what we have left.

We have hit a new plateau of our relationship, and love what we have together. If you were to ask either of us if we would be interested in doing the MDMA again, we would both say yes. It's not fair at all that my 25-year-old boyfriend may die before the turn of the century, but what MDMA has given him is something that alot of people will *never* find. It's almost like we can take one night together, and turn it into a couple of years worth of closeness.

Is it wrong?

I know it's wrong to say that we are trying to live our full life together in a hurry, but that's kind of what it is. We took one night to open up completely to each other, and solve problems that would have killed the rest of our life together. The second night, we felt so close and so in tune, it was like time stood still and we lay there for an eternity and just felt like we were inside of each other. Our eternity is going to be cut short by cancer, this we know... we should be able to feel as if we *are* living our lives together, growing old together, making the most of what we *do* have. Maybe we *are* making our life together in one or two nights, but that is more than I can say for many people who essentially *have* a lifetime to enjoy each other. We don't, and we know this. It's as if time stood still that night and gave us a lifetime worth of feeling. A lifetime worth of love.

Summary

Do I regret taking an "illegal drug" these two nights? I consider myself to be a law-abiding citizen who has respect for the law. What I *do* regret is that we *did* have to break the law to be able to share with each other. To be able to have what others *can* take a lifetime to achieve. We don't have that proverbial lifetime together... guaranteed. But by having "broken the law" and done MDMA together, we have the chance to bring a lifetime of love and understanding into our short time together. Now, tell me, which part of this should be illegal... •

Letters can be sent to Sue and Shane care of MAPS.

MAPS Annual Report: Fiscal Year 1996 – 97

Rick Doblin
MAPS President

Fiscal Year 1996-97 began the second decade of MAPS' existence. Income rose dramatically over that of FY 95-96, permitting MAPS to support an expanded number of projects. As in previous years, MAPS' statement of income and expenses is published in the Bulletin along with a detailed explanation of the individual items. In this way, MAPS members can review exactly how their donations were allocated and what expenses were incurred. This report is an invitation for dialogue; MAPS members are encouraged to review this report and share with the staff any comments, suggestions or questions that they would like to offer. MAPS will continue to flourish only to the extent that the expenditures it makes correspond closely to the priorities of its members. As a result, we publish this detailed accounting and seek your input.

Project overview

Among other accomplishments in the area of research, MAPS laid the groundwork in FY 96-97 for Dr. Abrams' historic success in FY 97-98 in obtaining permission and funding for the first study of the medical use of marijuana in a patient population in fifteen years. MAPS also facilitated Dr. Russo's initial NIH grant application for research into the use of marijuana in the treatment of migraines and his serotonin assays with a variety of Amazonian plants and other psychoactive substances. MAPS supported Drs. Grob and Poland's submission to the FDA of the first protocol seeking to study the use of MDMA in a patient population in the United States since MDMA was placed in Schedule 1 in 1985, funded MDMA neurotoxicity research, and successfully assisted Dr. Evgeny Krupitsky in designing, implementing and obtaining funding (from both MAPS and the Heffter Research Institute) for the first study ever conducted into the use of ketamine in the treatment of heroin addiction. MAPS also began the 35-42 year follow-up to Dr. Oscar Janiger's pioneering LSD research, the longest follow-up study ever conducted into the use of a psychedelic drug. MAPS lent assistance to Benny Shanon, Ph.D. in his study of the cognitive effects of ayahuasca, and supported the development of protocols by Drs. Yensen and Dryer for their proposed LSD research, and by John McClusky, M.S.W. for his proposed peyote research.

Among other accomplishments in the area of education, the MAPS Bulletin continued to be both an aesthetic and informational success, a large number of people learned about the medical use of marijuana from projects supported by MAPS and implemented by the Cannabis Action Network and Chris Conrad with Mikki Norris, and the collaborative MAPS, Heffter Research Institute (HRI) and Albert Hofmann Foundation project of an on-line psychedelic bibliography gathered momentum. MAPS also devoted much staff time to the editing of *The Secret Chief*, the first book ever published by MAPS, now available in FY 97-98.

Financial overview

MAPS' expenditures in FY 96-97 amounted to $255,746. This compares to expenditures of $185,797 in FY 95-96, and $133,153 in FY 94-95.

MAPS' income in FY 96-97 was an astonishing $558,683. This compares to $200,182 in FY 95-96 and $107,184 in FY 94-95. The increase in income in FY 96-97 as compared to FY 95-96 was primarily due to the receipt of the final disbursement of Eric Bass' estate, in the amount of $329,583. The increase in income in FY 95-96 as compared to FY 94-95 was also largely due to preliminary disbursements from the estate of Eric Bass, in the amount to $63,203.

In addition to income actually received in FY 96-97, MAPS has also obtained a pledge of $58,000 from the Barnhart Foundation for Dr. Charles Grob's proposed research project into the use of MDMA in the treatment of pain and distress in cancer patients. This grant will be allocated only after all the required regulatory approvals have been obtained, hopefully in early 1998.

At the close of FY 96-97, MAPS had assets of $347,494, plus remainder interest worth about $23,000 in a home in La Jolla, California that will become solely owned by MAPS in approximately 40 years. In addition, MAPS owns computer and office equipment worth about $5,000. This compares to assets at the end of FY 95-96 of $44,367 plus the remainder interest in the La Jolla home and computer equipment worth about $2,000, and assets of $29,981 at the end of FY 94-95 plus computer equipment worth about $1,500.

MAPS' financial picture has improved remarkably in FY 96-97. However, it must be kept in mind that clinical trials into the risks and benefits of psychedelic drugs and marijuana are exceedingly expensive. For example, Dr. Donald Abrams' initial safety study into the medical use of smoked marijuana in the treatment of AIDS patients will cost $978,000. Fortunately, the National Institute on Drug Abuse is providing a grant for this project, turning a total of $10,000 that MAPS donated to UC San Francisco for the expenses that Dr. Abrams and his team incurred in the preparation of two National Institutes on Health (NIH) grant applications into almost $1 million. Realistically, MAPS cannot depend on government or foundation grants for all or even most of its projects.

When MAPS' resources are matched against its goals, it becomes clear that MAPS needs to continue to utilize a strategy of providing money for pilot studies or the preparation of grant applications that will hopefully be able to generate additional resources from more traditional sources. MAPS can itself fund major clinical trials only if it receives donations on a scale which it has yet to obtain.

Detailed income report

MAPS' income in FY 96-97 was $558,683. Of this amount, $329,583 came from the final disbursement of the estate of Eric Bass, $44,500 came from Foundation grants (Zimmer Foundation—$34,500; Drug Policy Foundation—$5,000; Peter Lewis Foundation—$5,000), $17,023 came from investment income (dividends, interest and realized capital gains) and $167,575 came from donations. Donations from the 10 individual donors who contributed $1,000 or more amounted to $84,704. MAPS' approximately 1,400 other members contributed a total of $82,871, for an average donation of about $60.

Of the donations of $1,000 or more, Tim Butcher gave $20,000 for MDMA neurotoxicity research at Harbor-UCLA Medical Center and $7,500 for computers for the MAPS office and for Dr. Karl Jansen's MDMA neurotoxicity research project at the Maudsley Hospital in England. Robert Barnhart gave $19,818.75, some for Dr. Grob's research into the use of MDMA psychotherapy in the treatment of cancer patients and some which will be used for the Janiger follow-up project. John Gilmore gave $9,435.50 which he prefers to have allocated to medical marijuana-related projects. Bob Wallace gave $12,450, of which at least $10,000 is being allocated to the publication and marketing of *The Secret Chief*, the first book that MAPS has published (see page 29). Nicholas Saunders donated to MAPS all of his royalties from the sale of his book, *Dance, Trance and Transformation*. These royalties amounted to $4,500 in FY 96-97. Unrestricted gifts were received in the amounts of $4,000 (which was allocated to Dr. Evgeny Krupitsky's research into the use of ketamine in the treatment of heroin addiction), $3,000 and $2,000. There were two unrestricted gifts of $1,000.

Much of the income that MAPS received in FY 96-97 was from extraordinary, non-repeating sources. There will be no more disbursements from the Eric Bass estate. Though the Zimmer Foundation continues to make restricted donations to MAPS for educational purposes primarily related to the medical use of marijuana, neither the grant from the Peter Lewis Foundation, for the preparation of Dr. Abrams' NIH grant application, nor the Drug Policy Foundation grant, for efforts to initiate a fully licensed and legal farm to produce marijuana for FDA-approved research, are recurring. Royalty income from *Dance, Trance and Transformation* has slowed considerably now that the book has

MAPS Financial Statement FY 96-97

	Research	*Education*	*Staff*	*Office*
MDMA—Grob (UCLA) Phase 2	14,559.70			
MDMA—Jansen (UK)	4,054.55			
MDMA—neurotoxicity	16,763.00			
MDMA—graduate fellowship	20,000.00			
MDMA—sample analysis	1,000.00			
Ketamine—heroin abuse	8,827.48			
LSD—substance abuse	2,500.00			
Peyote—alcoholism	1,200.00			
Ayahuasca—cognitive psychology	1,545.96			
LSD—Janiger follow-up	4,419.29			
Serotonin assay—Russo	2,500.00			
Cannabis—Russo/NIH migraine protocol	3,500.00			
Cannabis—Abrams/NIH HIV protocol	5,000.00			
Cannabis Patient Registry	4,790.53			
Cannabis Action Network		9,000.00		
Creative Xpression		24,500.00		
Feb. 1997 NIH Workshop: Med. Mj.		611.10		
Web—Psychedelic Bibliography		2,798.00		
1996 ITA Conference		2,174.98		
Postage & Mailing		7,380.33		
MAPS Bulletin		15,369.02		
Copies		1,909.54		
Phones		4,886.93		
Internet		1,277.64		
Books and tapes		1,464.96		
Membership drive		4,608.29		
Advertisment		1,690.00		
Information		243.46		
Staff travel			5,433.59	
Conference fees			1,800.00	
Professional services			1,464.67	
Salary, benefits, taxes			64,931.61	
Office supplies				1,420.56
Office rent				5,588.04
Computer equipment				5,494.93
Office equipment				614.54
Fees—bank, etc.				423.50
Totals	**90,660.51**	**77,914.25**	**73,629.87**	**13,541.57**

Grand Totals (Below)		*Research*	*Education*	*Staff*	*Office*
FY 96-97	255,746.20	90,660.51	77,914.25	73,629.87	13,541.57
FY 95-96	185,797.04	84,169.71	46,144.15	48,490.06	6,993.12
FY 94-95	133,153.19	48,680.13	35,212.68	42,199.87	7,060.51

FY 96-97 Balance

Income* $558,683 — Net Assets May 31, 1997** $347,494

Expenditures $255,746 — Net Assets May 31, 1996** $44,367

MAPS' financial picture has improved remarkably in FY 96-97. However, it must be kept in mind that clinical trials into the risks and benefits of psychedelic drugs and marijuana are exceedingly expensive.

* Income does not include in-kind donations: graphic design, internet technical assistance and web site hosting, office volunteer work.

** Assets do not include remainder interest worth about $23,000 in a home in La Jolla, California that will become solely owned by MAPS in approximately 40 years. In addition, MAPS owned computer and office equipment worth $5,000 at the end of FY 96-97 compared to computer equipment worth $2,000 at the end of FY 95-96. Net assets reflects valuation of MAPS' investment portfolio at year end, in addition to differences between income and expenses.

been on the market about a year. In addition, many of the contributions from individuals who donated over $1,000 were one-time gifts for specific projects.

From an organizational development standpoint, the donations of less than $1,000 from MAPS' approximately 1,400 members form the core recurring resource. In FY 96-97, these donations amounted to $82,871, for an average of about $60 each. In FY 95-96, MAPS received $57,127 in donations of less than $1,000 from its about 1000 members, with an average of about $57 per member.

In order to increase the stability of MAPS as an organization, it is necessary to increase the number of members who contribute regular membership donations. MAPS added about 400 members in this last fiscal year. In FY 97-98, MAPS is embarking on a combined membership/fundraising drive in association with the Heffter Research Institute, in hopes of increasing membership by an additional 500-1,000 members.

Detailed expenditure report

Total expenditures for FY 96-97 amounted to $255,746. This compares to expenditures of $185,797 in FY 95-96, and $133,153 in FY 94-95. The expenditures have been divided into four categories; research, education, staff and office. In FY 96-97, MAPS allocated $90,660 to research, $77,914 to education, $73,629 to staff and $13,541 to office.

Research projects

Funding research with psychedelics and marijuana is the top priority for MAPS. The rationale for this priority is that research is the most accepted and direct route towards the creation of legal contexts for the medical, therapeutic use of these drugs.

In line with this priority, MAPS spent $90,660 on research in FY 96-97. The bulk of this money, $56,377, was allocated to projects involving MDMA. The rationale for the emphasis on MDMA is that MDMA is the drug that is likely to be the easiest to integrate into psychiatry, primarily because the MDMA experience is gentle yet profound, without much of the challenging perceptual and cognitive effects of the classic psychedelics. Furthermore, MDMA is relatively short-acting, making it easier to introduce its use into a psychiatrist's schedule.

The remaining $34,283 spent on research in FY 96-97 went to projects involving LSD, ketamine, peyote, ayahuasca, various Amazonian psychoactive plants, and marijuana.

MDMA cancer patient study

Dr. Charles Grob and Russell Poland, Ph.D, Harbor-UCLA Medical Center, are the co-principle investigators for the proposed study into the use of MDMA in the treatment of psychological distress and physical pain in end-stage cancer patients. MAPS donated $12,500 to Dr. Russell Poland, Harbor-UCLA Medical Center, for his work involved in the protocol development and approval process. MAPS used funds from the Eric Bass bequest for this grant. MAPS has also obtained a pledge of $58,000 for this study from the Barnhart Foundation, contingent upon obtaining all the necessary approvals.

Drs. Grob and Poland and the FDA have been engaged for the last several months in an informal protocol review process. The protocol was formally submitted to the FDA for review in November 1997. The completion of the protocol approval process may take from three to six months. In addition to the FDA, the protocol must be approved by Harbor-UCLA Medical Center's Institutional Review Board (IRB) and the California Research Advisory Panel, which must approve all research with Schedule 1 drugs in California. Hopefully, it will be possible to obtain the necessary approvals for this project without undue delay.

Neurotoxicity studies

From July 1996 to April 1997, MAPS invested $16,7630 in an MDMA neurotoxicity study in rats conducted by Kate Chapman, working under the direction of Dr. Russell Poland. This study gathered information about the extent of serotonin reductions in rats given doses in the human therapeutic range, information which was largely missing from the scientific record. This study has determined the "no effect level" in rats for serotonin reductions. When coupled with the results of the MDMA blood level study (described below) to be conducted by Ms. Christine Cloak, also working under the direction of Dr. Russell Poland, it will be possible to put the current data about MDMA neurotoxicity into a more accurate context.

This study, as well as the Poland/Cloak study, was funded by MAPS largely because such information could be crucial in obtaining permission from the California Research Advisory Panel and the Harbor-UCLA Medical School (IRB) for the MDMA cancer patient study in humans. For this experiment, MAPS used the proceeds of an earlier grant arranged by Nicholas Saunders for MDMA research as well as some of the proceeds that MAPS received from the royalties from Nicholas Saunders' book on MDMA, *Ecstasy: Dance, Trance, and Transformation.*

Fellowship for MDMA neurotoxicity research

In September and October 1996, MAPS donated a total of $20,000 to the Research and Education Institute of Harbor-UCLA Medical School for a graduate student fellowship for Ms. Christine Cloak. Ms. Cloak is working on an MDMA neurotoxicity study in rats under the direction of Dr. Russ Poland. MAPS received a restricted grant of $20,000 for this purpose from Tim Butcher. This donation represented the first graduate student fellowship that MAPS has ever awarded.

This study will correlate blood levels of MDMA with the extent of reductions in serotonin. Previous studies have focused on correlating dosage, but not explicitly blood levels, with serotonin reductions. Increasingly, the FDA wants to see data

based on blood levels. Preliminary indications are that blood levels of MDMA in rats are higher than with comparable doses in humans, suggesting that the amounts of MDMA that may cause reductions in serotonin in humans may be larger than previously estimated from the comparison of relative dosage levels.

MDMA neurotoxicity research in England

In late 1996, MAPS donated $4,000 for a computer to Dr. Karl Jansen of the Maudsley Hospital in London, to be used for data analysis and word processing for a study comparing the serotonin systems of heavy MDMA users with those of a group of matched controls. MAPS funded this project through the use of $4,000 donated by Tim Butcher. Unfortunately, there were technical problems in the data gathering phase of the experiment and parts of the study will need to be repeated.

This study did not involve the actual administration of MDMA to human subjects but was intended to lead to an application for permission to conduct a study in which MDMA would be administered to humans whose response would be measured by functional MRI technology. Unfortunately, it now looks unlikely that Dr. Jansen will be able to obtain permission in the near future for human studies administering MDMA, given the intense political controversy surrounding MDMA in England.

Dr. Jansen has used the computer to write and publish a paper on the relationship between ketamine and near-death experiences. The paper is entitled "The Ketamine Model of the Near Death Experience: A Central Role for the NMDA Receptor" and the reference is Jansen, K. L. R. (1997) *Journal of Near-Death Studies* Vol. 16, No. 1, Fall 1997, pp. 1-95.

MDMA Analysis Project

MAPS conducted a study in FY 95-96 into the composition of street samples of MDMA. The final expenditure of $1,000 for that study was made in FY 96-97. Results of this study were reported in the Spring 1996 MAPS Bulletin, Vol. VI, No. 3, pp. 11-13.

Ketamine heroin addiction study

Dr. Evgeny Krupitsky has conducted research into the use of ketamine in the treatment of alcoholism for the last ten years. A paper about this research by Dr. Krupitsky and associates, extensively edited by MAPS, appeared in the *Journal of Psychoactive Drugs*, Vol. 29 (2), April-June 1997, pp. 165-183.

Dr. Krupitsky returned to Russia in late March 1997 from Yale Medical School, where he spent a year working on ketamine research with Dr. John Krystal on a research fellowship funded by the National Institute of Alcoholism and Alcohol Abuse (NIAAA). Drs. Krupitsky and Krystal have continued their collaboration as a result of a new grant they received.

In March 1997, MAPS donated $8,000 to Dr. Evgeny Krupitsky for the first year of a three-year study of the use of ketamine-assisted psychotherapy in the treatment of heroin addiction. MAPS has committed an additional $8,000 per year for each of the remaining two years of the study. The study will take place in Russia at the Leningrad Regional Center for the Treatment of Addiction. MAPS also assisted Dr. Krupitsky in the protocol design process. In early 1997, several patients were treated by Dr. Krupitsky's associates in a small pilot version of the ketamine heroin addiction study. The study has entered full-scale implementation now that Dr. Krupitsky has returned to Russia.

In September 1997, the Heffter Research Institute (HRI) pledged $5,000 a year for three years to Dr. Krupitsky for this study, to be used primarily for expenses involved in a more extensive and prolonged follow-up of the subjects than originally proposed. The gathering of this additional data will help generate data on treatment outcome that goes beyond what is usually collected in drug abuse treatment research. The joint sponsorship of Dr. Krupitsky's study by HRI and MAPS is an example of the increasingly collaborative nature of the relationship between these two organizations, both of which are working to support psychedelic research.

LSD research project

Drs. Richard Yensen and Donna Dryer have been working for many years to obtain FDA permission to administer LSD to humans within a therapeutic context. They have been focusing on protocols for the use of LSD in the treatment of substance abusers and for the use of LSD in the psychological treatment of cancer patients. In 1993, MAPS raised $5,000 for their research at the 50th Anniversary of LSD conference. Over the years, MAPS has disbursed some of that money for various protocol development expenses. In April 1997, MAPS paid out the remaining $1,500 of the $5,000 and an additional $1,000 for protocol development expenses and the purchase of various psychological tests to be used in their experiments.

In October 1997, FDA sent a letter to Drs. Yensen and Dryer in which it placed in writing

In order to increase the stability of MAPS, it is necessary to increase the number of members who contribute regular membership donations. MAPS added 400 members in this last fiscal year.

a list of issues that need to be addressed prior to FDA approval of any research protocol, thereby clarifying the protocol design issues with which the FDA is most concerned. One fundamental issue concerns the determination of an adequate control group, no easy task with any psychedelic since the classic double-blind design is inadequate due to the not surprising fact that most subjects and experimenters can determine whether the subjects received LSD or a placebo.

Drs. Yensen and Dryer are now engaged in the process of redesigning the protocol in response to the FDA's October 1997 letter. It is hoped that a study for the use of LSD in the treatment of cancer patients will be approved in early 1998. MAPS has pledged $2,500 in further protocol development expenses and an additional $10,000 in direct expenses once the study is finally approved.

Peyote and alcoholism study

John McClusky, M.S.W. is planning to conduct a study of the use of peyote for the treatment of alcoholism in the context of Native American Church services. John is hoping to complete a dissertation about this project at the University of Arizona at Tucson. Leo Mercado, founder and director of the Peyote Foundation, has established contacts with Native American Church leaders and has built a facility where services can take place.

MAPS has donated $1,200 toward preliminary expenses involved in planning this project. Some of these funds have gone toward the purchase of a tipi in which the peyote services will take place. MAPS has committed to providing an additional $1,600 upon the initiation of the study (see page 3).

Ayahuasca cognitive psychology project

MAPS disbursed $1,545 in FY 96-97 out of a pledged $5,000 to Prof. Benny Shanon, Hebrew University, Jerusalem, for the writing of a paper for publication analyzing the effect of ayahuasca on cognitive processing. Prof. Shanon is a tenured professor in the Psychology Department at Hebrew University with many publications in the field of cognitive psychology. Prof. Shanon's paper will analyze the reports he gathered from about 30 subjects describing their own experiences with ayahuasca as well as his own self-reports from about 75 experiences he had with ayahuasca in Peru and Brazil over the last several years. A preliminary report on his findings appeared in the Summer 1997 MAPS Bulletin, Vol VII, #3, pp. 13-15.

The funding from MAPS will be used by Prof. Shanon to support the work of research assistants to categorize and analyze his data, to purchase books and journals on ayahuasca, psychedelic research, transpersonal psychology and altered states of consciousness for the Hebrew University library, and for a computer for his office.

One additional benefit of working with Prof. Shanon is that he may be able to locate researchers in Israel who would like to investigate the therapeutic use of MDMA in the treatment of PTSD or another psychiatric condition. MAPS has long had a goal, so far unmet, of initiating MDMA psychotherapy research outside of the United States.

LSD research follow-up

MAPS spent $4,419 in FY 96-97 for an important follow-up study to early LSD research that was conducted from 1954-1962 by Dr. Oscar Janiger. Approximately $20,000 will be spent in FY 97-98 to complete this project. The follow-up interviews have been conducted by Kate Chapman, who, along with the assistance of a private detective, helped locate and interview over 45 of the original subjects. The interviews are being transcribed by Maureen Alioto, a professional transcriber and researcher with experience in qualitative research involving issues related to drug use.

Dr. Janiger's original study was a naturalistic study of the effects of LSD in healthy volunteers. Cary Grant, Anaïs Nin and Jack Nicholson, as well as many artists, doctors, housewives, etc., were subjects. All told, approximately 800 people were administered LSD in an attempt to determine the acute effects of LSD as people described them. Dr. Janiger's files contain session reports from about 1/3 of these subjects as well as information about the subjects' names, birthdates, occupation, religion and race. As of April 15, Kate Chapman began working full-time to conduct interviews and help locate subjects. In early May 1997, MAPS spent $2,000 to hire a private detective to locate 20 subjects.

Ever since I conducted the twenty-five year follow-up to Dr. Walter Pahnke's classic 1962 Good Friday experiment into the potential of psilocybin to facilitate mystical experiences (Doblin R, Pahnke's "Good Friday Experiment": A long-term follow-up and methodological critique, *J Transpersonal Psychology*, Vol. 23, no. 1, 1991, pp. 1-28.), I have realized the power and importance of trying to determine the long-term effects of psychedelic experiences. For the last two years, MAPS has been setting the groundwork for this long-term follow-up to Dr. Janiger's study. Many of the subjects are no longer living but a substantial number are. This is a fascinating look at people who took LSD before all the cultural hysteria took place. Many of the original subjects are models of accomplishment according to cultural standards and would not at all fit the stereotype of countercultural drug users.

One big advantage of this study is that no permission is required from a governmental authority since no drugs will be administered. One disadvantage is that this study is not a therapeutic clinical trial and will not help out with the FDA in terms of making psychedelics into approved medicines. However, this study could have a powerful educational impact about the risks and benefits of psychedelics, which is also important in paving the way to the creation of legal contexts for the use of psychedelics. Of course, everything depends on what the people

we manage to find and interview have to say.

Serotonin assay project

This project, conducted by Dr. Ethan Russo, U. of Montana, is a laboratory study designed to evaluate the interaction between various subtypes of serotonin receptors in test-tubes and several psychoactive plants, psychedelic drugs and marijuana. The purpose of the study is to identify possible candidates for the treatment of migraine headaches, which involve the serotonin system.

MAPS supported this study with a $2,500 grant in order to play a small role in a basic science project involving psychedelics and marijuana. While not a study in humans, this project is designed to lead to such studies if promising potential medicines are identified.

Marijuana and migraine study

From March-May 1997, MAPS donated $3,500 to Dr. Ethan Russo to support the efforts and expenses required of him and his associates to prepare their first NIH grant application for funding and a legal supply of marijuana for their proposed experiment. Dr. Russo's grant application was submitted to NIH before the June 1, 1997 deadline. MAPS' $3,500 funding support to Dr. Russo came from a $5,000 grant to MAPS from the Zimmer Family Foundation to support the preparation of NIH grant applications for the investigation of the medical uses of marijuana.

Dr. Russo's protocol was designed primarily to investigate the use of smoked marijuana, the oral THC capsule, and an injected narcotic painkiller used in the treatment of migraine sufferers who do not respond to standard medication. This proposed study would take place within a hospital or medical clinic where patients whose migraines do not respond to other medication go to receive the injected narcotic painkiller.

In early November, Dr. Russo learned that his NIH grant application was rejected and did not receive a priority score. This means that his protocol is not being considered for funding and cannot be considered to have passed the peer review process. The rationale for the rejection will be sent to Dr. Russo in mid to late December.

This rejection was not unexpected though it is deeply disappointing. Dr. Abrams's first NIH grant application was also rejected without receiving a priority score. It is rare that any NIH grant application is approved and funded the first time it is submitted. Furthermore, while marijuana has been used in the United States for the treatment of migraines for over a century, this use is not well known and there is no active political constituency fighting for this specific medical use of marijuana.

Neither Dr. Russo nor MAPS is going to give up on this project. Dr. Russo will redesign and resubmit his NIH grant proposal in light of the rationale given for its rejection. MAPS and Dr. Russo will also work towards having NIH accept the recommendation of its Expert Committee on the Medical Utility of Marijuana, which in an August 1997 statement proposed that NIDA provide marijuana to all FDA-approved projects regardless of whether they were funded by NIH, state or non-governmental sources. If this policy were put into place, medical marijuana research would be expedited.

Dr. Russo's project is most likely delayed at least a year before it can start. However, his grant application has at least started a process that has a good chance of eventually leading to another medical marijuana research project. If we are lucky, Dr Russo will not need to work on securing approval for his study for five and a half years, which is how long it took Dr. Abrams.

Cannabis Patient Registry

MAPS allocated $4,790 in FY 96-97, and $5,078 in FY 95-96, to the Cannabis Patient Registry, a project conceived and directed by Sylvia Thyssen of MAPS. Funding for this project came in part from a $7,400 grant from the Drug Policy Foundation obtained in FY 95-96. Approximately 650 patients have filled out the CPR questionnaire, several hundred from around the country and about 450 from the Oakland Cannabis Cooperative. Experience with the CPR has demonstrated that its value has primarily been to provide emotional support for the patients and to network patients and activists. The CPR has not proven to be an especially good tool for research but has helped to get an idea in what direction research could go. In this role, the CPR survey has contributed to the development of other questionnaires, most notably one that will be implemented in Northern California by Kaiser Permanente.

Marijuana and HIV

MAPS has been working with Dr. Donald Abrams, UC San Francisco, for five and a half years in a collaborative effort to initiate research into the medical use of marijuana to treat HIV-related wasting syndrome. In February 1997, MAPS donated $5,000 to UC San Francisco to support the efforts and expenses required of Dr. Abrams and his associates to prepare their second National Institutes of Health (NIH)

Funding research with psychedelics and marijuana is the top priority of MAPS. The rationale for this priority is that research is the most accepted and direct route towards the creation of legal contexts for the medical, therapeutic use of these drugs.

grant application for funding and a legal supply of marijuana for their experiment. MAPS received a restricted grant of $5,000 for this project from Mr. Peter Lewis' PLACE Fund.

NIH approval of a grant application is currently a pre-condition for obtaining a legal supply of marijuana set by the National Institute on Drug Abuse (NIDA), which has a monopoly on the supply. MAPS previously donated $5,000 to UC San Francisco for Dr. Abrams' first NIH grant application, which was rejected.

This grant application was submitted to NIH on May 1, 1997. The protocol, "Short-term Effects of Cannabinoids in HIV Patients," is primarily a safety study designed to investigate the impact of the use of marijuana or oral THC capsule (Marinol, dronabinol) or placebo for 21 days on HIV viral load, various immune and organ system parameters, and the pharmacokinetics of indinavir, one of the most widely prescribed protease inhibitors. The study will also gather data about the degree to which marijuana, oral THC and placebo increase appetite, food intake and weight gain, though nothing conclusive in this regard can be determined from only a 21 day period of use.

At the end of September 1997, Dr. Abrams was informed by NIDA that his grant application had been accepted and that he would receive his grant request of $978,000 in its entirety. The study, which will take two years to complete, should begin in early 1998. MAPS successfully leveraged its $5,000 grant for Dr. Abrams' second NIH grant application into almost $1 million. Looking at the broader picture, however, about $3.5 million was spent on the California and Arizona initiatives which catalyzed the Federal Government to rethink its opposition to medical marijuana research. Furthermore, NIDA has received a lot of critical publicity for obstructing Dr. Abrams' research by previously refusing to supply marijuana to Dr. Abrams' initial FDA-approved protocol. Perhaps to remedy this public perception, NIDA encouraged Dr. Abrams to submit his revised NIH grant application to it rather than to the National Institute on Allergies and Infectious Diseases (NIAID), the agency which reviewed and rejected his first NIH grant application.

If this initial experiment generates promising results, additional studies will need to be conducted that more fully evaluate marijuana's efficacy. Those additional studies will take at least several months to design after the results of the initial study are fully evaluated. Furthermore, it will take three to nine months at a minimum to obtain approval for these subsequent studies, especially if NIDA's policy to provide marijuana only to studies that pass NIH peer review remains in force. As a result, five years from now is the soonest that we can expect FDA approval of the medical use of marijuana for the treatment of wasting syndrome, even if the studies generate data demonstrating conclusively that marijuana is safe and effective in the treatment of HIV-related wasting syndrome.

Education

MAPS allocated $77,914 to education in FY 96-97, $46,144 in FY 95-96, and $35,212 in FY 94-95. This aspect of MAPS' activity includes the printing and mailing of the MAPS Bulletin, copies, phones, internet connections, postage, advertisement, books and tapes, membership drive, subscriptions, and several educational projects. These projects include a medical marijuana education effort conducted by the Cannabis Action Network (CAN), research and writing of a book on the health aspects of marijuana, educational material distributed at a National Institutes of Health workshop on the medical utility of marijuana, an electronic bibliography of scientific papers on psychedelics for the MAPS web site, and a workshop on psychedelic research at a 1996 conference of the International Transpersonal Association.

CAN medical marijuana education project

CAN has a presence at concerts and colleges around the country at which it educates mostly young people about marijuana's medical use, the use of hemp as a commercial product, and marijuana policy. MAPS donated $9,000 to CAN to support a portion of its costs associated with its medical marijuana educational efforts. MAPS obtained a $9,000 restricted grant from the Zimmer Family Foundation for this purpose.

Hemp for Health book project

MAPS donated $24,500 to Chris Conrad and Mikki Norris for their work in researching and writing a book on the health aspects of the use of marijuana. The book, *Hemp for Health*, was published in April 1997 and includes a printed version of the Cannabis Patient Registry patient questionnaire. MAPS obtained a $24,500 restricted grant from the Zimmer Family Foundation for this project.

NIH workshop on the medical utility of marijuana

This conference held February 19-20, 1997 was the Clinton Administration's second scientific response to the increasing pressure for FDA-approved research into the medical uses of marijuana, the first response being a $1 million grant from the Office of National Drug Control Policy to the Institute of Medicine (IOM) to review the literature on medical marijuana. The literature review that the IOM will take about two years and $1 million to conduct seems like an expensive delay tactic and was essentially conducted in several days at this NIH workshop. MAPS, in association with other reform organizations, prepared an informational handout that we gave to every participant at the NIH conference. The cost to MAPS of printing this informational handout was $611.

The result of the NIH workshop was, somewhat surprisingly, an endorsement of the need for research into the medical uses of

marijuana. MAPS contributed both oral and written statements to the Expert Committee charged with developing recommendations to NIH. The formal report of this Committee was supposed to be released in March but took until August. The formal report itself made a number of noteworthy recommendations, among them that research into the medical use of marijuana be encouraged and that NIDA adopt a new policy of providing marijuana to all FDA-approved projects, regardless of whether they were funded by NIH, state or private sources. If this policy had been previously in place, Dr. Abrams would have been able to begin medical marijuana research three years ago. Unfortunately, the recommendations of the NIH Expert Committee remain just recommendations and have not yet been adopted as policy by NIH.

MAPS web site

The MAPS web site has been a very important educational tool and a source of contacts from new members, major funders and researchers. The MAPS web site has been visited ("hits") over 83,000 times since early November 1996. The web site is maintained by Eric Katt on a volunteer basis and is supervised and modified by Sylvia Thyssen. The server space, in San Francisco, is donated by Jim and Julie Petersen. Additional investment in upgrading the MAPS web site to provide secure electronic transfer of credit card information has been instituted in FY 97-98.

On-line psychedelic bibliography

The on-line psychedelic bibliography is a shared project between MAPS, HRI and the Albert Hofmann Foundation. A total of $2,798 was spent in FY 96-97 on the project, the goal of which is to put into electronic form the Sandoz bibliography of all scientific papers published about LSD and psilocybin from their initial synthesis up to about 1980, when Sandoz stopped collecting research papers. What remains to be done is to scan the titles and abstracts of all the remaining papers into electronic form and categorize each paper into one of eighteen categories originally established by Sandoz but only applied to about 540 of the papers. This categorization will permit electronic searching of the database by category as well as keyword. When this project is complete, the on-line psychedelic bibliography will be a powerful tool for students and researchers. An estimated $4,000 remains to be spent on this project. In addition to paid staff, a team of volunteers led by Tim DeLorey, Ph.D. has been working diligently on this project.

1996 ITA conference

MAPS sponsored many of the costs associated with the psychedelic track at the 1996 International Transpersonal Association (ITA) conference, chaired by Dr. Stan Grof. MAPS allocated $4,989 to this effort in FY 95-96. An additional $2,174 in expenses for this project was paid in FY 96-97.

MAPS Bulletin

The MAPS Bulletin, formerly the MAPS Newsletter, is the major educational project of MAPS. MAPS spent $15,369 on printing the Bulletin and used a substantial fraction of the $7,380 spent on postage to mail it. The Bulletin continues to take a great deal of staff time as well as the donated time and talent of a graphic designer who has contributed a much-appreciated professional sense of art and style. Contributors are still eager to submit articles and the quality of each issue remains excellent. We have now added a barcode so that it can be more easily vended at newsstands and bookstores. MAPS suffered a slight setback when one of its distributors went bankrupt, causing MAPS to lose about $1,500. However, a large, well-established distributor recently picked up the Bulletin, and we hope that more stores across the country will carry it as a result.

Increasing membership

In order for organizational expenses (salaries, Bulletins, phone, rent, etc.) to be met by membership fees alone and not also by special donations, MAPS needs to increase its membership to about 2,250. The standard methods to build membership are by direct mail solicitation or advertising. MAPS spent $1,690 on advertising in FY 96-97, $1,190 for a full-page ad in the issue of *Tricycle* that focused on the intersection between psychedelics and Buddhism, and $500 for an ad in the first issue of *The Resonance Project*. The ad in *Tricycle* brought in enough new members to cover its costs. As far as we can tell, the ad in *The Resonance Project* did not cover its costs.

MAPS, in collaboration with the Heffter Research Institute (HRI), sent out one direct mail appeal for members this year to the 20,000 members of the Drug Policy Foundation, at a cost of $4,608. MAPS and HRI agreed to split the costs and the income from the mailing, with MAPS sending out the Bulletin to all new members and HRI sending out one copy of its forthcoming Heffter Research Review. As a result of this mailing, MAPS increased its support by about 125 members. This response rate covered all costs and raised an additional

Comments or questions from MAPS members concerning this annual report are invited. Only with the continued support of its members can MAPS continue to build in FY 97-98 on its successes of FY 96-97.

$1,800 but did not result in as many new members as hoped. One reason may be that the brochure was included with the DPF newsletter and was not sent out in its own envelope where it may have gotten more attention. MAPS is planning to send out additional direct mail fundraising appeals in FY 97-98, also in association with HRI. MAPS also requests that each MAPS member consider asking just one friend to also join MAPS.

Staff

MAPS allocated $73,629 to staff in FY 96-97, $48,490 in FY 95-96, and $42,199 in FY 94-95. The primary reason for the increase was a rise in salaries in the direction of, but not equivalent to, market value for jobs in the private sector with similar responsibilities and required skills. In FY 95-96, MAPS had two full-time employees, Rick Doblin, earning $18,000 a year, and Sylvia Thyssen, earning $20,800 a year plus health care benefits. In FY 96-97, Rick Doblin received a salary of $30,000 a year and Sylvia Thyssen received a salary of $26,000 a year plus health care benefits. Carla Higdon also starting working part-time for MAPS at an hourly salary of $8.25 plus health care benefits. The increase in salaries was made possible as a result of the receipt of the remaining portion of Eric Bass' bequest. In FY 97-98, Rick Doblin's salary will not be increased, Sylvia Thyssen has received a raise to slightly over $30,000 a year, plus health care benefits and Carla Higdon has become a full-time employee with a weekly salary of $360 plus health care benefits.

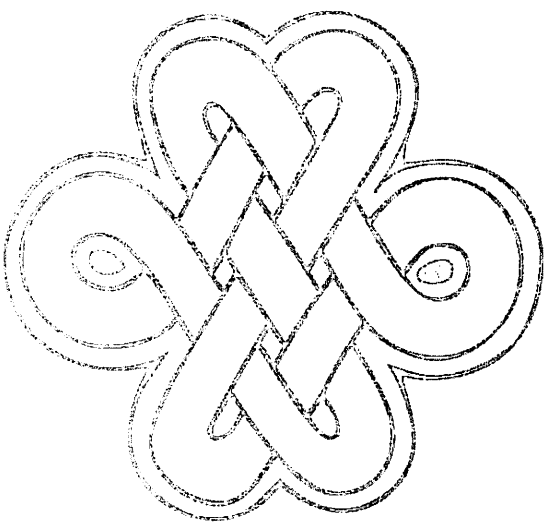
Office

MAPS allocated $13,541 to office expenditures in FY 96-97, $6,993 in FY 95-96, and $7,060 in FY 94-95. There was an increase in expenditures on computer equipment from $1,136 in FY 95-96 to $5,494 in FY 96-97, as a result of a gift of $3,500 from Tim Butcher for this purpose. There was also an increase in rent expenses from $3,750 in FY 95-96 to $5,588 in FY 96-97. Staff outgrew previous space and had to acquire additional space.

Summary

FY 96-97 represented a dramatic increase in income, expenditures and number of projects over FY 95-96. FY 96-97 also saw the addition of a third part-time staff member, Carla Higdon, who is now working full-time.

Comments or questions from MAPS members concerning this annual report are invited. Only with the continued support of its members can MAPS continue to build in FY 97-98 on its successes of FY 96-97. •



READERS FORUM

Psychedelic Threads: MAPS-forum online

The MAPS online mailing list, *MAPS-forum*, has over 230 subscribers. Recent topics of discussion have included current news, book reviews, factual questions about psychedelics or marijuana, psychedelics and marijuana in the media, ideas for research and fundraising, anthropologists as researchers of psychedelic subcultures, the importance of the amateur scientist in psychedelic research, and articles from the MAPS Bulletin. Students who have written class papers on psychedelic topics are encouraged to share their work. Questions about anything MAPS is doing, or suggestions for anything MAPS should be doing, are encouraged. General drug policy discussions (prohibition vs. legalization) are not encouraged unless they specifically relate to research. Examples of acceptable drug policy topics include: the influence of drug policy on research, or the policy implications of research. Questions are welcome at all levels of interest but posted comments should be presented at a level appropriate for a classroom or a professional meeting. Primarily, this means to assume a skeptical audience. The online forum seems like it will enrich this section of the MAPS Bulletin, *the Readers Forum.*

Psychedelics 101: What the field of psychedelic research holds for you

MAPS regularly gets inquiries from undergraduates and graduate students who are interested in entering the field of "psychedelic studies" and request a list of programs and resources to help them in their quest for an appropriate school or department. There is currently no master list of such programs and no systematic source of information.

Generally, finding a mentor or ally in one's department is an essential step. An entering student should not assume that he or she will be able to convince faculty to support a psychedelic drug research project unless their faculty profile or previous publications explicitly mention such an interest. There are, however, a number of ways of finding faculty with the right interests. The best way is to use Medline, and to search for people who have published psychological or behavioral articles on keywords such as "psychedelic, hallucinogen, LSD, psilocybin, psilocin, DMT, mescaline, or MDMA" in the past five years.

To psychology students who contact us, we generally recommend that they familiarize themselves with the field of Transpersonal Psychology, as psychedelic therapy is often explained under this paradigm. *The Common Boundary Graduate Education Guide: Holistic Programs and Resources Intergrating Spirituality and Psychology* is an excellent list of alternative programs which includes over 1,200 well-indexed resources. You can order it from *Common Boundary* at (301) 652-9495, or check on their website www.commonboundary.org.

To respond to students of chemistry, biology and other "hard sciences," we asked Dr. David Nichols for insight. His response appears below, followed by a question that was e-mailed to MAPS, along with Rick Doblin's reply.

We will continue to try and respond to the needs of students interested in "psychedelic studies."•

Sylvia Thyssen
MAPS Networks Coordinator
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Dr. Nichols comments: How does one go about performing research with psychedelics?

Stated succinctly, you have two broad options: Medicine and Science. Under Medicine, I continue to believe that physicians with a psychiatry residency and research experience will make the greatest contributions to the field of psychedelics. This is a long and difficult row to hoe, however, and few choose it. But this option allows you ultimately to work with humans, where the results are most dramatic and have the greatest impact. Rats cannot tell you if they see the white light!

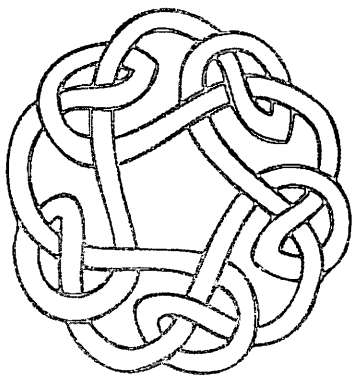
Under Science, you again have two broad options: Pharmacology and Chemistry (loosely defined). In pharmacology, one might study the behavioral effects (usually in rats) or the neurochemical effects of substances. You could choose a whole animal behavioral approach (e.g. in Dr. Mark Geyer's lab at UC-San Diego), a systems/neuronal approach (Dr. George Aghajanian at Yale who does unit cell recording... tedious but interesting), or a more molecular approach (e.g. Dr. Elaine Sanders-Bush at Vanderbilt or Dr. Bryan Roth at Case-Western Reserve) that would involve the expression of receptors, structure of receptors, etc. I do some behavioral work at Purdue, but we use behavior more as a screen to guide our chemistry.

In chemistry, my lab at Purdue is, I would argue, the major place (but perhaps I have a bias!). Dr. Richard Glennon at Virginia Com-

monwealth has done a lot of chemistry of psychedelics but more recently has focused on some other areas. Despite the romance and popularity that attend to natural drugs and herbal remedies, there is no academic department I know of that focuses on the ethnopharmacology of psychoactive drugs or psychedelics. There is a big natural products group at the University of Illinois at Chicago, but they are mostly working on anticancer drugs (as, in fact, are most natural products groups these days).

Getting into this field is extremely difficult and requires a lot of patience. You are swimming upstream because there is no recognized value to these substances at government funding agencies except as drugs of abuse. You have to find some niche to get funded. It is very hard, even for one with a respectable and already-established track record.

You can, however, enter this research with a Ph.D. that has nothing to do with psychedelics at all. My own son just completed a Ph.D. in drosophila genetics. He is now going to do a postdoctoral fellowship in a laboratory studying the molecular regulation of the 5-HT2A receptor, the site with which psychedelics seem to interact. This will take another two to three years. Although I have no idea what he will do after that, he would have the training to enter an academic path and then to study the molecular biology of any brain receptors he chose, including perhaps continuing work on the 5-HT2A receptor. Thus, he could end up doing research on psychedelics, even though he started out with fruit fly genetics.



I think one must have dedication, and motivation must be very strong to begin study for an advanced degree with the ultimate objective of doing psychedelic research. I have had three students who came here with the idea they would work in this area, and none of them have. One is now doing DNA sequencing work, another is a computational chemist, and the third became disillusioned with academic life at a small private college and went into professional pharmacy. Some begin with curiosity as a result of personal experience, but quickly lose interest, get married, have families and revert to more "normal" pursuits once the luster wears off.

You will also find you have no real colleagues. If you were in cancer or HIV research, or were working on the human genome project, for example, you would be part of a large science community, with many colleagues of similar interest. If you do psychedelic research, and that is all you do (I have some other more mainstream research in addition to the psychedelic work), you have perhaps half a dozen people world-wide who share your research interests. Perhaps not surprisingly, you may develop a sort of cult following, but that kind of adoration is not particularly fulfilling. People occasionally tell me that my name is known all over the world in the "psychedelic community." While that may be true, it doesn't get recognition within the scientific community, which is my workplace, comprised of my peers. What you want is recognition from them that you are doing good work. You are unlikely to get it, so your rewards must come from within yourself, and you must believe that someday the value of your work will become clear to other people, because that is unlikely to occur in your own lifetime. It will help if you are the sort of person who can deal easily with delayed gratification.

I know I have painted a fairly unglamorous picture. I have done that because those who begin graduate school with the idea that psychedelic research will be glamorous and fun burn out quickly. You're simply not going to get the strokes you'd get if you did more mainstream work. If you have long term vision and believe in what you are doing, it has its rewards. I love my work. My graduate students and I have a lot of fun together. But sometimes it is lonely. I hope that someday things will turn around and someone will be grateful that I did what I did. But I think it takes a particular kind of stoic personality to survive much adversity on the strength of that kind of belief!

If you choose that path, then you are fully informed and you will not be disappointed later when you start encountering the expected obstacles. •

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What kind of research is MAPS interested in funding?

Dear MAPS,

I am trying to get a handle on the big picture of how one goes about performing research with psychedelics. I have numerous lines of research that I want to pursue, beginning with some very basic research to examine baseline shifts in performance on perceptual/attentional/cognitive tasks, on up to standard experimental paradigms with the ultimate goal to implement these with MRI further down the road.

At the moment, however, I do not know how to begin step one since the certainty of my geographical location expires in two months. I assume that we would want research done in a university lab somewhere, rather than a closet-turned-lab in my own home? This relates to the issue of professional versus amateur. Certainly I can take all of the programs running on a computer here in the lab and they will run just as well on a computer in my home—there is no difference, but if that would not be considered acceptable, then I need to focus my energy towards finding a lab that will go for this.

So, my questions are: what kind of research (professional versus amateur) is MAPS interested in funding? What labs in Europe and the United States should I contact about research ideas? And what is the procedure for applying for MAPS funding for research? As much as I'd love to spend the rest of my life on a beach on a tropical island, I feel I know too much to not use what I know to further this cause. •

Mark Olson
Neuroscience Program
University of Illinois
http://www.students.uiuc.edu/~m-olson/

Dear Mark,

Great questions. *What kind of research (professional versus amateur) is MAPS interested in funding?*

We don't really make a distinction between professional v. amateur but instead focus on rigorous v. lax.

MAPS' priorities are:

1) Research that focuses on a therapeutic use of a psychedelic or marijuana, because this is the most accepted and quickest route, in my opinion, to some limited form of legal access to these drugs. For example, Dr. Charles Grob's proposed study on the use of MDMA in the treatment of pain and distress in cancer patients: MAPS has obtained a grant of $58,000 for this study from the Barnhart Foundation. Also, the research of Evgeny Krupitsky, Ph.D. into the use of ketamine in the treatment of heroin addiction: MAPS budgeted $24,000 for this study and Heffter budgeted $15,000. Also, Dr. Donald Abrams' study of the use of smoked marijuana in HIV patients, which just received a NIDA grant in the amount of $978,000 after MAPS donated $10,000 to Dr. Abrams for his team's expenses in preparing two NIH grant applications.

2) Research that asks interesting scientific questions about the psychological, cognitive, non-physiological aspects of psychedelics or marijuana, because this helps to legitimize the study of the interaction between these drugs and consciousness. For example, the study by Benny Shanon, Ph.D. into the impact of ayahuasca on cognitive processing, for which MAPS budgeted $5,000.

3) Research into the physiological consequences of these drugs, since this helps open the door to more involvement with these drugs from the scientific community. For example, ayahuasca pharmacokinetics, conducted by J.C. Callaway, Ph.D. in Dr. Deborah Mash's lab (University of Miami) to which MAPS donated $5,000. MAPS also donated $35,000 for research into MDMA neurotoxicity in rats. However, when this research is completed, MAPS hopes that no additional animal studies will be necessary.

4) Research into the risks and benefits of the non-medical use of these drugs. For example, the follow-up study to Dr. Oscar Janiger's LSD research from 1954-1962, which was a naturalistic study. MAPS has already donated about $15,000 to this study, with about $10,000 or so to go.

5) Research into the use of psychedelics in other cultures. For example, studies with ayahuasca to which MAPS will soon donate $2,000, and studies of the use of Peyote (see pages 3-5).

6) Educational efforts. For example, the Sandoz bibliography project which is in the process of classifying and putting abstracts online for all published papers about LSD and psilocybin. MAPS is budgeting about $5,000 for this project.

7) Other interesting projects.

The key here is that MAPS has limited resources and so focuses primarily on funding pilot studies that can be used as part of larger grant applications to more traditional sources of funding. Since traditional sources of funding are reluctant to get involved, MAPS will fund larger studies as well, if resources allow.

What labs in Europe and the United States should I contact about research ideas?

In Europe, the main lab doing research with psychedelics is directed by Dr. Franz Vollenweider, vollen@bli.unizh.ch (or contact Alex Gamma, gamma@blisun1.unizh.ch). In the United States, you can try Dr. Charles Grob, GROB@afp76.humc.edu, and Dr. Reese Jones, reese@itsa.ucsf.edu.

In Israel, for cognitive psychology, try Benny Shanon at msshanon@pluto.mscc.huji.ac.il. Dr. Shanon conducts all his ayahuasca research in Brazil but would be a helpful consultant.

What is the procedure for applying for MAPS funding for research?

We pride ourselves on having the fastest, easiest grant review process. Just let me know your idea via a few paragraphs on e-mail, then we talk it over on the phone and I tell you right then or within a few days if MAPS is interested in exploring the matter further. Then we work on a protocol and a budget, perhaps getting it reviewed by some other experts. Then we make a committment pending approval, perhaps giving a small grant for trying to get approval.

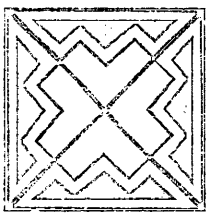
Then the approval process begins. You need to get FDA approval to administer any Schedule 1 drug, and approval from an Institutional Review Board (IRB) either affiliated with a hospital

or university, or independent.

Basically, MAPS would be interested in supporting some sort of study that you would be interested in conducting involving baseline shifts in performance on perceptual/attentional/cognitive tasks, or MRI studies (though cost starts to become a factor here). I can suggest that you contact Jon Frederick, smiile@utkux.utcc.utk.edu, the administrator of MAPS-forum, who is also interested in such a studies. It will not be easy to get permission for it, but MAPS would definitely like to help open up this field of inquiry. More specifically, MAPS can relatively easily allocate a grant of $5,000 for a specific project. A grant of $10,000 would take a bit more thought, and would need to be clearly linked to how the research would develop, and to plans to submit the data to other funders for continuation of this line of research. Grants in excess of $10,000 are possible but I would probably want to shop the protocol around to potential funders so as to try to bring in contributions specifically for the project.

That's about enough for now. If you have any other questions, just ask. MAPS would like to help you get started on some research project. MAPS is also planning to include a new section on its web page that will list projects related to psychedelic research that are in need of funding.•

Rick Doblin
MAPS President
rick@maps.org



From Sweden

I wanted to do something about psychedelic drugs and their effects, but without breaking the law. As I couldn't find any study in Swedish about what kinds of experiences people have had, in Spring 1997 I decided to do one. All I could find in Swedish was about "crisis," "psychosis" and harmful effects. My original paper in Swedish is 50 pages. Here is a short summary in English.

Summary

Psychedelic Drugs—A study of drug-induced experiences related to Stanislav Grof's model of the human unconscious

Psychedelic drugs provide a lot of puzzling experiences. LSD-assisted psychotherapy has been evaluated by Stanislav Grof and he also proposes a new expanded model of the human unconscious. The purpose of this study was to provide information about experiences obtained by illegal drug users and evaluate if these are consistent with Grof's descriptions. Fifteen anonymous drug users answered a questionnaire about use, experiences, circumstances and influences of their life. It included detailed questions about out-of-body experiences, telepathy, identification with other people or animals, seeing unknown buildings and landscapes, contact with "extra terrestrial creatures," bliss, fear, ego-loss and so on. I also had question about if they believed in "some kind of God" and "some kind of life after death" and if these beliefs had changed after they used psychedelics.

All of them had some experiences similar to Grof's descriptions. Transpersonal experiences were reported more often by the "heavy" users. Such experiences were also more likely to be reported by those who have practiced some other conciousness-expanding technique (like meditation), by those who described themselves as spiritual seekers and by those who make some form of ritual or mental preparation part of their experience. More users reported positive than negative effects regarding social relations with their families and general quality of life and also about their attitudes towards death. This study could be a basis for an expanded study, which could serve as a starting point for a discussion about therapeutic potentials of these substances.

This study also provides general information about Grof's model, the history of LSD and also some about psychedelic research worldwide.

Many people at my university have found my study and the results interesting. None had ever heard that psychedelics have therapeutic potential. Now I'm trying to get ideas for a new study for next year, probably something with floating-tanks. I would appreciate all kinds of ideas and suggestions for this, and also for contact with others with serious interest in related research. Not many people here are interested in such questions, so I really appreciate MAPS.•

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The MAPS Bulletin in prison

People who receive MAPS in prison are occasionally denied access to the Bulletin, or to enclosures that are perceived by prison officials as promoting drug use. The following is excerpted from a letter about such a situation:

I wrote you back in January or February to tell you that the prison officials had confiscated a MAPS publication. I told you that I was filing an Administrative Remedy to appeal that decision and I sent you a copy.

Well, the Warden denied my Administrative Remedy saying the publication was a threat to security and that it promoted drug use. So I sent another Administrative Remedy to the regional administrator in Atlanta. After several weeks of delay, they gave the publication to me (it was the Summer 1996 issue) and asked if I would withdraw my appeal. Since I got what I had wanted, I went ahead and withdrew the appeal. I'm told that this is the first time someone won on this issue (at FCI Jesup) in seven years.

I'm not sure that you care, but since I said that I would keep you updated, I wanted to make sure I did. Enclosed are the most pertinent papers from the process. I really enjoy your publications and I appreciate the work you do. •

Mark Small
41690-004 IBL
FCI Yazoo City
P.O. Box 5000
Yazoo City, MS 39194-5000

National Institutes of Health Research on Ecstasy

Interested in participating in research? Researchers at the Johns Hopkins Medical Institutions and the National Institutes of Health are collaborating to investigate the long-term effects of (±) 3,4 Methylenedioxymethamphetamine (MDMA, "Ecstasy") on brain serotonin neurons.

Participants will stay in a clinical research facility for five days and four nights and receive a volunteer fee of $500.00 (or one hundred dollars per test day). Johns Hopkins University arranges and pays for travel. Meals are provided. No MDMA is actually given during the course of testing.

MDMA has been shown to produce long-lasting damage to serotonin cells in rats and monkeys. We hope to learn whether the use of this drug produces similar damage in humans, and if so, whether there are behavioral consequences. Serotonin is involved in the regulation of many behaviors including mood, hunger, pain perception, sleep, and cognition.

Over the course of the 5-day study, subjects will participate in a variety of psychological and biological tests that evaluate serotonin functioning.

In order to be eligible for this research project, volunteers must be between 18-65 years of age and agree not to take illicit drugs for a period of three weeks prior to the first day of the study. Please note that we will conduct blood and urine tests.

If you are currently using Esctasy or have used it in the past, we would be interested in hearing from you.•

For more information, please contact:
Victoria Ellison at the National Institutes of Health
victoriae@sparky.nimh.nih.gov or 301-550-2588
or Kelly Lowe at Johns Hopkins University
klowe@welchlink.welch.jhu.edu ot 410-550-2596.
The URL for this research is www.welch.jhu.edu/~klowe. •

Hats off to the list administrator

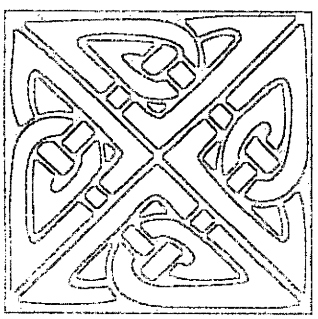
I would like to take this opportunity to express my pleasure in the range, diversity, and content of the MAPS-forum. Nowhere on the Internet have I found the depth of discussion which has been presented here on a topic of such pressing national interest. Special regards to Jon Frederick for undertaking the task of forum moderator. Most graduate students would not have either the maturity or the time to do the quality job which he has done. Well done, hats off.

Received via e-mail

The importance of amateur research

I am *not* a scientist. However, we were all raised and educated in a culture that values "Science" as *the* primary tool of our age. But Science is just that—a *tool*. Keep in mind the saying, "When the only tool you have is a hammer, every problem looks like a lot like a nail."

Science is based on the ability to quantify. Human behavior is notably difficult to quantify because of the vast number of variables that must be accounted for. We are not objects, but a complex symbiosis of interactive "systems." *And* taking a cue from Werner Heisenberg's uncertainty principle, the method used (to study a particular phenomena) directly determines not only the type of result, but affects the subject as well. When the reason we are investigating these substances is to get a better picture of *how* the brain works, (that's quantifiable...) then scientific inquiry is the best tool we have for the job.



But... Perhaps not all inquiry into entheogens is meant to be "scientific" inquiry. I would propose and suggest perhaps, "poetic" inquiry, "mystical" inquiry, "noetic" or "gnostic" inquiry could also provide us with some valuable results. Much of the "amateur" research that is being carried on falls into these categories.

Hofmann and Shulgin (both scientists) have proposed that the reintroduction of entheogens into the stream of human activity at this point in history may be some sort of "response message" or antidote to our dangerous infatuation with some of the "fruits" of science. The purpose of this message may well be to alert us to become more aware of those areas that cannot be defined and quantified by science.

I would like to know what those "researchers" who use the poetic, mystical or gnostic approach to entheogens have "learned." This may provide us with useful information. Reading (or listening to) the personal accounts of many explorers one so often encounters the phrase *"I learned a lot,"* or, *"It taught me so much,"* that it has become a psychedelic cliché. I would like to know, *what is it* you learned? *What was* that "so much" you were "taught?" *How* has that affected your life and your day-to-day? Can it be distilled into twenty (or 100) words and can you share it with the rest of us?

Knowing that "n" milligrams of substance "x" will precipitate response "y" in the brain certainly has its value. *But*, what else? How did you acquire this new knowledge you refer to? What was the method of transmission? Did you hear disembodied voices? *Who* or what is it that speaks to you? *What* is the content of the message? Are there common themes in the experiences of numerous reporters? What are those themes? Are those themes affected by cultural background or are they "universal?"

One last thought about amateurs: Consider the role of the "outlaw" (or "amateur researcher") in the history of humanity. Since the first arboreal primate descended to the ground (*"looks like some good fruit laying down there..."*) while his family called from the limbs above, "get back up here, the lions will eat you," every significant step on our long road from those trees has been made by an "outlaw" or "amateur researcher" (and miscellaneous other misfits) who defied conventional wisdom, challenged the dominant paradigm and made each important incremental step that is part of what we have come to call "progress." Looking back through history at that first "amateur researcher" who climbed down from the tree, aren't we all his/her children? Thanks for your indulgence.
Onward...

Mark Plummer
Received via e-mail

MDMA research reviewed

Studies of MDMA users

MDMA was the topic of a symposium at the *1997 Annual Conference of the British Psychological Society*. The symposium received some press, including an article in the June 21, 1997 issue of *New Scientist*. This article, along with an editorial supporting MDMA research in humans, is available over the web:

http://www.newscientist.com/ns/970621/necstasy.html

http://www.newscientist.com/ns/970621/editorial.html

Of the studies presented at this meeting, I believe only H. Valerie Curran and Ross A. Travill's work has been published (*Addiction*, 1997 Jul, 92(7):821-31). Their paper, entitled "Mood and cognitive effects of +/- 3,4-methylenedioxymethamphetamine (MDMA, 'ecstasy'): week-end 'high' followed by mid-week low," compares the acute and residual effects of alcohol and MDMA.

In this work, the researchers recruited 24 volunteers from a night club and measured their mood, reported physical symptoms, and performance on several memory and attentional tasks. Twelve volunteers reported using alcohol alone, while another 12 said they used MDMA alone. (Unfortunately, the volunteers' reports were not verified with urine or blood samples and some of the MDMA users later admitted to using small amounts of alcohol also.) The first measurements occurred on a Saturday night while the volunteers were experiencing the effects of their chosen drug. Subsequent measurements were made the next afternoon (Sunday) and again on Wednesday.

Measurements of depression

Although some differences were found in the memory and attentional tasks, the most pronounced differences were detected using the Beck Depression Inventory (BDI). The BDI is a widely used 21-item questionnaire which asks about mood, sleep, decision making, interest in others, and other aspects of life which are made worse by depression. The researchers found that MDMA users were distinctly *not* depressed while experiencing MDMA. However, their scores became worse the next day and even worse on Wednesday. In fact, some volunteers had Wednesday BDI scores which suggested they might have mild to moderate clinical depression. Alcohol users, in contrast, had middling moods which remained on the worse end of the normal range.

These data are interesting and raise several questions. Without a true baseline measurement, it is difficult to tell how much the Wednesday scores reflect a residual effect of the drug and how much they reflect the drug-free condition of these subjects. If it is largely a residual drug effect, it would be particularly interesting to know how long the depressed mood lasted. Depressed mood has been previously reported by users (e.g., Peroutka et al., 1988), but its time course and severity have not been measured using a standard method.

The researchers raise the possibility that the volunteers' depressed mood might be due to the unpleasant experience of returning to mundane life after experiencing "utter fulfillment." If this psychological explanation is true, it suggests that MDMA's putative therapeutic effect is not automatically achieved by taking the compound and that additional factors may be needed for it to improve the user's life.

Stimulant use study

It is worth noting that depressed mood is well documented after stimulant use and is not usually thought to be related to neurotoxic effects. A newly published survey by Sara Williamson, Michael Gossop, Beverly Powis, Paul Griffith, Jane Fountain, and John Strang nicely illustrates this. This research, published in *Drug and Alcohol Dependence* (1997, 44:87-94) as "Adverse effects of stimulant drugs in a community sample of drug users," compared 158 London-area users' reports of the adverse effects of MDMA, cocaine hydrochloride, and amphetamine.

The study found a suprisingly similar incidence and severity of severe side effects from MDMA and cocaine hydrochloride (which is not considered neurotoxic). For example, when asked whether they had ever had a bad experience with the drug, 21% of subjects said "yes" for MDMA and 24% for cocaine. A little under 10% of subjects reported experiencing severe depression after MDMA or cocaine. (Of course, these subjects are almost certainly using a nontechnical definition of depression, and are not necessarily identifying themselves as having been clinically depressed.) By quantifying the reported severity of ten possible adverse effects, the researchers created adverse effect severity scores for the three drugs. Cocaine received a severity score of 8.3, MDMA a score of 9.6 and amphetamine a score of 12.4.

Given the different reputations of MDMA and cocaine, their similarity in this study is a little suprising. This may be a reflection of the particular subjects in the study, who were mostly white, unemployed, polydrug users who reported regular use of stimulants. Their experiences may not be the same as other populations with other patterns of use. Controlled, clinical use of stimulants is likely to involve fewer adverse effects. On the other hand, out-of-control, dependent use of stimulants will produce more frequent and severe adverse effects than were reported in this study. Subjects in this study also generally snorted cocaine, which is associated with reduced adverse effects in comparison to smoking or injecting it (Gossop et al., 1994).

I also suspect that individuals who experience severe adverse reactions to one stimulant are subsequently more likely to experience them after other stimulants. Preclinical studies of sensitization to the effects of regular stimulant use (Segal and Kucsenski, 1987) and clinical studies of amphetamine psychosis (Angrist, 1994) provide some support for this idea. If so, a history of adverse reactions to stimulants might have predisposed the subjects to adverse events with MDMA. However, this is just speculation. The data in this study were not analyzed in a way that lets us tell whether the individual subjects reported similar profiles of adverse effects for the three drugs (as my theory would predict).

Administration of MDMA in the laboratory

Jordi Camí and his colleagues described the results of their double-blind, placebo-controlled MDMA research at the 1997

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College on Problems of Drug Dependence meeting in June. No really earthshaking findings, just a careful preliminary study which further demonstrates that MDMA can be safely administered in the lab. What follows is the abstract:

Pharmacological Effects of MDMA in Humans: Dose-Finding Pilot Study.

Camí J; Mas M, Farré M, San L, Roset PN, Mas A, Poudevida S, de la Torre R, Dept of Pharmacology and Toxicology, Institut Municipal d'Investigació Mèdica (IMIM), Universitat Autónoma de Barcelona, Barcelona, Spain.

3,4-Methylenedioxymethamphetamine (MDMA) is a synthetic amphetamine derivative. Although MDMA is an increasingly popular recreational drug among American and European young people, there are only a few experimental data of its pharmacological properties in humans (Grob et al., *Behav Brain Res* 1996; 73: 103-7). This study was designed to assess the acute pharmacological effects of MDMA, and to determine the dose to be used in future investigations. Six healthy male recreational users of MDMA participated in different experimental sessions (4-8). They received single oral doses of MDMA (50, 75, 100, 125 and 150 mg), amphetamine sulphate (AMP 20, 30, 35, 40 mg) or placebo. Drugs were administered double-blind and randomized (lower doses were allocated before higher doses for safety reasons). Study variables included: vital signs (blood pressure, heart rate, temperature, pupil diameter), psychomotor performance (reaction time, DSST, Maddox-wing), and subjective effects (visual analog scales, ARCI-49 item short form and POMS questionnaire). MDMA and AMP produced a dose-related increase in blood pressure, heart rate (different time profile for both drugs) and pupil size (only MDMA). No significant changes were found on psychomotor tasks, although AMP produced a slight improvement. MDMA produced higher scores on subjective effects and drug-induced euphoria ("high," "liking," ARCI-MBG) than AMP. A dose-response relationship was found for MDMA effects. Only MDMA produced slight changes in visual and body perceptions. The results seem to indicate that MDMA could have high abuse potential. This study was supported by grants: FIS 97/1198, CIRIT 95-SGR-00432, ISC-III 97/43444 and CITRAN.

Fenfluramine neurotoxicity review paper: a model of clarity

Una McCann, Lewis Seiden, Lewis Rubin, and George Ricaurte recently published an excellent review article in *JAMA* (August 27, 1997-Vol 278(8): 666-672) entitled "Brain serotonin neurotoxicity and primary pulmonary hypertension from fenfluramine and dexfenfluramine: a systematic review of the evidence." Although fenfluramine and dexfenfluramine are not psychedelic, they can produce long-term brain effects (neurotoxicity) in animals similar to those found with MDMA.

Determining the relevance of fenfluramine and MDMA animal toxicity data to human use is difficult. Comparisons across species involve many subtleties. For example, if MDMA toxicity is related to the levels of drug in the brain (a plausible if unproven theory), it may not be sufficient to use a normal human dose (about 2.0 mg of drug per kg of body weight) in a rat study. Because rats tend to metabolize drugs faster, higher doses may be needed in rats to achieve the drug concentrations normally reached in the human brain. Of course, increasing the doses rats receive may produce other effects which do not normally occur in humans. These sorts of toxicokinetic issues are central to the question of MDMA's safety.

Unfortunately, most publications in the MDMA neurotoxicity literature extensively describe their technical findings and only briefly discuss the relevance of these findings to human use. This is somewhat understandable since the main goal of the research is often limited to understanding the mechanisms of MDMA's pharmacological effects. Still, animal toxicity data research is largely interesting because it is believed relevant to humans. It is unfortunate that clear discussions of this topic are rare.

In contrast to the average technically focused paper, McCann and her colleagues provide an admirably clear, if brief, review of these matters. They carefully define their use of terms like "long term" and "neurotoxicity" and mention three different ways of trying to compare doses in animals to humans. Papers such as this go a long way towards clarifying the toxicokinetic issues at hand. When issues are clearly stated, they can be studied and our understanding of animal models of neurotoxicity improved. Along with controlled human studies, this will do a lot to resolve the safety issues concerning MDMA.

Addendum

After this essay was written, another paper from the British Psychological Society meeting was published: Davison D.; Parrott, A.C. (1997) Ecstasy (MDMA) in Recreational Users: Self-Reported Psychological and Physiological Effects, *Human Psychopharmacology*, 12:221-226. In this paper, 20 MDMA users were asked to describe the psychological and physiological effects of MDMA. In addition, George Ricaurte's group has presented at the *1997 Annual Meeting of the Society for Neuroscience* evidence of reduced serotonin transporters in MDMA users when compared to a drug-experienced control group.•

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MAPS MEMBERSHIP INFORMATION

MAPS is a membership-based organization working to assist psychedelic researchers around the world design, obtain governmental approval, fund, conduct and report on psychedelic research in humans.

Founded in 1986, MAPS is an IRS approved 501 (c)(3) non-profit corporation funded by tax-deductible donations from about 1,400 members.

MAPS' founder and current president, Rick Doblin, is currently in the Ph.D. program in Public Policy at Harvard's Kennedy School of Government and has previously graduated from Stan and Christina Grof's Holotropic Breathwork 3-year training program.

Sylvia Thyssen is responsible for editing the Bulletin and coordinates MAPS' outreach efforts and member services. She is a Phi Beta Kappa graduate of the University of North Carolina at Chapel Hill, where she majored in Art History and French.

MAPS has previously funded basic scientific research in both humans and animals into the safety of MDMA (3,4-methylenedioxymethamphetamine, *Ecstasy*) and has opened a Drug Master File for MDMA at the U.S. Food and Drug Administration. MAPS is now focused primarily on assisting scientists to conduct human studies to generate essential information about the risks and psychotherapeutic benefits of MDMA, other psychedelics, and marijuana, with the goal of eventually gaining governmental approval for their medical uses.

Albert Einstein wrote: **"Imagination is more important than knowledge."** If you can even faintly imagine a cultural reintegration of the use of psychedelics and the states of mind they engender, please consider joining MAPS in supporting the expansion of scientific knowledge in this area. Progress is possible with the support of individuals who care enough to take individual and collective action. In addition to supporting research, your contributions will return to you the following benefits:

The MAPS Bulletin:
Each Bulletin will report on MAPS research in progress. In addition to reporting on research both in the United States and abroad, the Bulletin can include feature articles, reports on conferences, book reviews, Heffter Research Institute updates, and the Hofmann Report. Issues raised in letters, calls and e-mail from MAPS members may also be addressed, as may political developments that affect psychedelic research and usage.

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Rick Doblin,
MAPS President


Sylvia Thyssen,
Networks Coordinator


Carla Higdon,
Projects Coordinator

IN MEMORIAM

PROFESSOR JAN C. BASTIAANS, M.D.

1917-1997

Professor Bastiaans, a Dutch psychiatrist, was the first doctor to recognize Concentration Camp Syndrome and successfully treat camp survivors with a therapy involving LSD.

SEBASTIAN ORFALI

Sebastian Orfali, who died on Oct. 31 at age 51, was the most important publisher of psychedelic drug literature in the United States. As founder of And/Or Press and Ronin Publishing, he published books by Timothy Leary, John Lilly, Terence McKenna, Paul Krassner, Robert Anton Wilson, Peter Stafford and Bruce Eisner.

maps proudly announces

On september 18, 1997,

nida awarded dr. donald abrams, ucsf,

a grant of $978,000 for a study of

the use of smoked marijuana,

oral thc (dronabinol) and a placebo in hiv patients

being administered the protease inhibitor, indinavir.

the two year study will start in 1998

and will be the first fda-approved study

of the use of smoked marijuana

in a patient population in about fifteen years.

maps invested $10,000 on this project

(plus considerable staff time

over the course of more than five years)

to help dr. abrams obtain permission for this research.

in a sense, $10,000 has been leveraged

into almost $1,000,000.

thank you, maps members,

for your support!