

A Sketch of the Early History of Underground LSD Manufacturing

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I'm going to begin by giving you a little context. I first took LSD in April 1965; the experience changed my life drastically. The intense experience of oneness with the universe and the living things in it was so numinous that I was left feeling a strong compulsion to share this experience with as many people as possible. That led me to decide to make and hopefully give away a lot of LSD.

Over the following five years I became Owsley Stanley's apprentice (he later became known as Bear Stanley). I worked with him in two laboratories, set up two more laboratories after he retired and eventually was sentenced to 20 years in prison as a result. Fortunately my sentence was eventually reduced and I finally served less than 4 years in McNeil Island Penitentiary.

Years later I began researching the history of underground LSD manufacturing. I've spent over 10 years working part-time on gathering and organizing this history and I'm still making new discoveries. By its nature, underground LSD manufacturing is clandestine and secret. I don't think the whole story will ever be known. But I've learned a lot more than I knew when I began researching the subject and I'm going to share a little of it with you. I only have time to sketch a little of several complex stories but you'll see that they eventually converge. I should add a cautionary note; the testimony in criminal trials is not always truthful.

The first secret LSD manufacturing seems to have been done in service of governments. In the 1950s the US intelligence community reported that there were trainloads of ergot alkaloids moving behind the Iron Curtain. The fear was that Iron Curtain countries were making large amounts of LSD for use as a weapon. The American government responded by funding research by Eli Lilly Co into industrial scale LSD manufacturing (resulting in the Garbrecht and Pioch patents) and an Army research program at Edgewood Arsenal into incapacitating drugs including BZ and LSD. Dr Jim Ketchum recalls seeing a drum containing perhaps 40lbs of EA-1729 (the army code name for LSD-25) that appeared in his office at Edgewood Arsenal at one point; it disappeared a few days thereafter.¹

Meanwhile, on the civilian front: Bernard Copley was born in 1926² and was raised in Nebraska.³ In the late 1940s he moved to Joshua Tree, California where he was a masonry worker and an unsuccessful building contractor.³ He was interested in hypnosis and metaphysics and by the late 1950s ran into Dr. Oscar Janiger, a psychiatrist in Los Angeles who enrolled him in experiments with LSD.³ In 1962 Bernard Copley was publishing a pamphlet "Hallucinogenic Drugs and Their Application to Extrasensory Perception" which he sold under the business name Hypnosopic Institute.⁴

Bernard Roseman was born in Bronx, New York in 1933 or 1934 and was raised in Philadelphia, Pennsylvania.⁵ He dropped out of high school after the 11th grade due to financial difficulties

and traveled extensively through the United States and Mexico collecting various reptiles and amphibians for the Philadelphia Zoological Gardens and the San Antonio Zoological Gardens.⁶ In 1957 he moved to Joshua Tree California where he studied reptiles and amphibians and where he met Bernard Copley.⁷

By 1958 Bernard Roseman had returned to Philadelphia where he met Dr. James Grossman⁸, an organic chemist specializing in natural products, working for the Department of Agriculture in Philadelphia. Bernard Roseman and Dr. James Grossman traveled to California together where Bernard Roseman introduced Dr. James Grossman to Bernard Copley and the three of them participated in a peyote ceremony.⁹

Bernard Roseman shared an apartment in Los Angeles with Dr James Grossman in 1960 while they both worked at Cal Biochem.¹⁰ At his 1964 trial, Bernard Roseman later said that they made LSD in Dr. Grossman's lab at Cal Biochem using the Garbrecht method.¹¹ Late in 1960 they traveled to Europe together¹² and during that trip visited the Weismann Institute in Israel.¹³

During the first few months of 1963 Bernard Roseman and Bernard Copley traveled together offering impure bulk liquid LSD, which they said was made in Israel, for sale to researchers and clinicians including Dr. Bivins¹⁴, Myron Stolaroff in Menlo Park¹⁵, Dr. Wilson Van Dusen at Mendocino State Hospital¹⁶, Dr. Donald MacDonald¹⁷ of Vancouver Canada and Dr. Ross MacLean¹⁸ also of Canada. Myron Stolaroff bought some of their LSD¹⁹ and then reported them to the FDA.²⁰

Bernard Roseman and Bernard Copley were arrested on April 3, 1963 after they sold an undercover FDA agent several grams of impure LSD which they said had been made in Israel.²¹ They were charged with several crimes most of which were misdemeanors punishable by up to a year in jail, but one of which was a felony punishable by a longer prison sentence.²² The felony charge involved smuggling the LSD into the United States. They spent the next year preparing for the trial which took place in 1964.

While he was free on bail, Bernard Roseman published a book "LSD: The Age of Mind²³" in which he briefly described making some very impure LSD. This was to be his defense for the charge of smuggling LSD into the United States from Israel. He also wrote rather bitterly about Mr. Big in Canada who bought gasoline for his Rolls-Royce and his airplane by selling LSD; these were references to Al Hubbard. Bernard Roseman believed that Al Hubbard had convinced Myron Stolaroff to turn him in to them FDA.

Meanwhile, in the fall of 1963 a young man named Douglas George was living in Los Angeles and working at Aerojet General as an atmospheric physicist. A friend invited Douglas George to attend a lecture by Dr. Paul Bindrim, a psychologist. Dr. Paul Bindrim spoke about unusual states of consciousness, peak experiences that could be induced by taking LSD. Dr. Paul Bindrim held up a sign with patent number on it and told the audience that LSD was easy to make.²⁴

Douglas George copied down the patent number and looked it up in the Los Angeles library. It was most likely the Pioch patent (Douglas George's memory isn't clear about all the details now). Douglas George was able to buy all of the raw materials listed in the patent although he had to

order some through his work at Aerojet General. By the fall of 1963 Douglas George moved to Hermosa Beach and set up a tiny lab in his rented house. He tried to follow the procedure in the patent several times but it didn't work. Douglas George started asking around; he ran into a young prodigy who was attending the Claremont colleges working on his PhD in organic chemistry while he was only about 10 or 12 years old. That young fellow told Douglas George "Oh yeah, the patent is incomplete. They left out a crucial step." He told Douglas George the missing step.²⁴

Although he wasn't trained as a chemist Douglas George was able to successfully make LSD once he had the missing step of the process. He ended up with green goo. In retrospect, the reason he ended up with green goo is because he omitted the purification steps at the end of the Pioch process. At the time, Douglas George told himself that the effective dose of LSD was so small that any impurities would not be toxic. So he just tried taking increasing amounts of the green goo until he got the desired effect. He increased the dose 3 times in succession before he noticed an effect; he went to bed and had intense Technicolor dreams.²⁴

Ruthie Buxton, a friend of his, took some to Berkeley and spread the word that Douglas George had an acid factory. Half of Berkeley soon descended on Douglas George's house in Hermosa Beach. Douglas George gave away the LSD that he made to anyone who asked for it.²⁴

Augustus Owsley Stanley the third was born in 1935²⁵; he was named for his grandfather a US Senator from and the governor of Kentucky.²⁶ He acquired the nickname Bear because he had a hairy chest at a young age.²⁷ During the middle 1960s he was known as Owsley Stanley. He was very intelligent and had a perfect (but not photographic) memory^{27, 28}. His interests were broad and included art, ballet, Russian language and electronics. When he became interested in a subject he read everything he could find on that subject; this habit would serve him well when he later decided to make LSD.

In early 1964 another friend of Douglas George, Ray Brown, gave Owsley Stanley some of Douglas George's LSD.²⁴ It was Owsley Stanley's first LSD. A few months later Owsley Stanley told friend and attorney Al Matthews he had taken LSD. Al Matthews gave him a capsule of real Sandoz LSD. Owsley Stanley discovered that the LSD he had taken previously was a pale imitation. That's when he decided he should make his own to be sure of what he was getting.²⁸

By June 1, 1964 the San Francisco trial of Bernard Roseman and Bernard Copley was approaching its end. The San Francisco Call Bulletin published an article titled "The LSD Home Brew Case" which mentioned an article in the Journal of Organic Chemistry by an Eli Lilly scientist describing how to make LSD.²⁹ Newspaper articles about the trial also said that LSD was not difficult to make. Owsley Stanley read the newspaper articles with interest.²⁸

Bernard Roseman and Bernard Copley were convicted at the end of their trial. They were allowed to post appeal bond and they both jumped bail, one going to Mexico³⁰ and the other to Brazil³¹. They were eventually captured and sent to federal prison.^{30, 31}

Owsley Stanley, with his usual thoroughness, read everything he could find about the chemistry of making LSD including the Garbrecht patent mentioned in the newspaper article, the Pioch

patent and various papers and patents published by Hofmann and Stoll. All of the information he needed wasn't all in any single article or patent, but he put the pieces of the puzzle together. The earliest articles about lysergic acid amides from the 1930s explained most clearly about the delicacy of ergot alkaloids and lysergic acid compounds and the special handling they required.

In the winter of 1964 Owsley Stanley bought 40 g of lysergic acid from Sigma chemical company and made his first batch of LSD at the Green Factory in Berkeley, using the Garbrecht process.²⁸ It wasn't pure enough to crystallize because it had not been through chromatography.³² In February 1965 the Green Factory was raided and Owsley Stanley moved his lab to a small room in the basement of a friend's house in Los Angeles. There he successfully learned how to do chromatography and how to crystallize pure LSD.^{32, 33}

Shortly thereafter he and Melissa Cargill rented a house of their own in Los Angeles, on Laffler Road where he set up a full-scale LSD lab. He bought another 400 g of lysergic acid, this time from Cyclo Chemical Company. He made several grams of pure crystalline LSD and put some of it up in #5 gelatin capsules, after mixing it with diluants. He sold some by mail order. But he also sold a gram to a musician friend of his, Perry Lederman.^{34, 35}

Unexpectedly, Perry Lederman told everyone where he had obtained the LSD he was selling and Owsley Stanley instantly became famous.³⁴ His LSD was pure and the doses were strong – about 270 to 300 micrograms.

Owsley Stanley soon learned that capping LSD led to inconsistencies in dose size due to variations in how his helpers pressed the powder into the empty capsules. He bought tablet triturate boards of the kind used by compounding pharmacies and began making tablets which were harder to counterfeit and which delivered much more consistent doses. His quest for quality also led him to initially dispersing the LSD on 10% tri-basic calcium phosphate which he said binds tightly to the LSD before making up the remaining 90% of the tablet weight with lactose. He believed that this kept the LSD evenly distributed throughout the volume of the tablet instead of migrating to the surface as the moist tablet dried. The surface of tablets, blotters or capsules is often exposed to damaging UV light which breaks LSD down into undesirable lumi-LSD.^{35, 36}

The Los Angeles drug squad soon learned about Owsley Stanley and put him under surveillance. They went through his trash and found letters from his customers. They investigated and obtained copies of his orders for lysergic acid from Cyclo Chemical Company. All of these things were presented on May 13, 1966 to a US Senate subcommittee hearing on LSD and Marijuana use on college campuses.³⁷

By 1966 there were at least two large scale underground labs producing large amounts of LSD. One was the Pt Richmond, California lab set up by Owsley Stanley and Melissa Cargill where I worked as his apprentice and we made 300,000 doses (about 85 grams) of the LSD that was later called "White Lightning."³⁸ The other was in London, where Victor James Kapur, operating New North Chemists, began making rapidly increasing amounts of LSD using Ergotoxine base as a starting material and employing the Hofmann process with hydrazine.^{39, 40} He bought a total of 6.3 kg of Ergotoxine between September 22, 1966 and October 18, 1967.³⁹ According to press reports, most of the LSD from Victor James Kapur's London lab, with an alleged street value of

\$38 million, was sold in the United States.⁴¹ Press reports of drug quantities are often inflated, but Kapur may have made as much as a kilo of LSD, a very large amount for the time. No chromatographic columns were found in his lab so it is reasonable to assume his LSD was impure.

The number of new initiates to LSD use grew very rapidly between 1966 and 1970. According to a 2002 SAMSA report: “Between 1966 and 1970, the annual number of [hallucinogen] initiates rose almost sixfold, from 168,000 to 956,000.”⁴²

In the years between 1966 and 1970 many more underground LSD labs started production with at least several independent large scale manufacturing operations including:

- Mine jointly with Owsley Stanley, which produced about 300 grams of pure LSD using the Garbrecht process and chromatography⁴³ (the first Denver lab, 1967)
- On my own, which produced a few grams of pure LSD using the Garbrecht process and chromatography before it was busted (the second Denver lab, 1968)
- Mine jointly with Nick Sand, which produced over a kilo of Orange Sunshine LSD using the Garbrecht process and chromatography (Windsor 1968-1969)
- The Clearlight group in San Francisco which also used chromatography for purification (Windowpane)^{44, 45, 46, 47}
- The speckled barrel group in California⁴⁸
- The Richard Barth Sanders aka Eric Ghost's group in New York⁴⁹
- Labs in Paris and Orleans managed by Ron Stark which did not use chromatography^{50, 51}
⁵²
- Larry Freda's labs in California⁵³
- Barry Orlando and Bill Week's lab in an Airstream trailer buried in the southern California desert making impure LSD (they used the Garbrecht process and did not do chromatography)^{53, 54, 55}
- Richard Kemp's early Liverpool lab⁵⁰
- D.S.'s lab in southern California (his full name is embargoed currently)^{56, 57, 58}

And there were many smaller LSD labs as well as almost certainly other large systems I haven't yet uncovered.

Time doesn't permit going into further detail here. But you can see that there were many manufacturers using a variety of coupling methods and with widely varying quality standards, dose sizes, etc.

If you know of other LSD labs old enough to no longer be a criminal liability to anyone and want to share information with me, contact me at timothyscully@yahoo.com.

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