SAMPLE: INFORMAL LUNCH PRESENTATION, DELIVERED TO AMERICAN WINE INSTITUTE MEETING AT UC DAVIS.

I wish to thank your conference coordinator, Mira Bieler, for inviting me to speak with you this afternoon. Your conference title -- Coming to America: The olive as a metaphor for immigration -- raises in me a range of images and memories regarding my ethnic background as an American of Italian heritage. My great grandfather, Michael Grivetto, was born in Rivavolo di Canavesi, northeast of Torino. I have had the wonderful opportunity in the last several years to present lectures on food and culture in both Milan, and in Rome. On one of those trips I was hosted in Florence by one of my former students, Mr. Alessandro Vallecchi and his family; it especially pleasing to see Alessandro here today in the audience representing Frescobaldi.

Within a mile from our luncheon room, there is a well-known botanical landscape feature known to many in Davis as "The avenue of the olives." This is an olive tree-lined avenue west of our campus, and this country lane was the site of one of my personal triumphs. A number of years ago I ran and competed in the first Avenue of the Olives marathon. While I no longer run marathons -- sometimes I still walk this olive tree-lined lane on summer evenings at dusk. Walking among the trees there is a characteristic smell, a characteristic color to the leaves, and having lived and worked in Mediterranean countries including Algeria, Egypt, Greece, Israel, Italy, Lebanon, and Turkey -- these summer walks revive my memories of the Mediterranean, a geographical region that is my ancestral home.

As a nutritionist, I am drawn to the recent literature regarding Mediterranean diet, and reported beneficial health effects of fat calories from olive oil, set within a traditional diet based upon cereals (barley and wheat), legumes (chick-pea; fava bean; lentils), more fish than meat, and a suite of vegetables and fruits (especially citrus fruits and cruciferous vegetables), and of course wine as a beverage.

I like olive oil. While many Americans of non-Mediterranean extraction do not -- this behavior pattern is changing as Americans become more aware of the healthful properties of Mediterranean diet, and especially of health properties associated with olive oil and wine.

First, let me consider the olive.

The first locality for domestication of the olive or <u>Olea europea</u>, is the eastern Mediterranean. While the geographical district for first domestication, is debateable -- I know that it was not ancient Egypt. My work and that of others clearly documents that olives were introduced to Egypt by the Hyksos during the Second Intermediate Period, or about 1730-1580 B.C., and actual finds of olive trees in Egypt are later in date. There are no unequivocal depictions of olive trees in ancient Egyptian tomb paintings known to me. Yet the importance of the olive is such that olive leaves appeared as decorative crowns as part of the treasure found inside the tomb of king Tutankamon.

If we turn our attention northward, across the Mediterranean from Egypt to Greece, the olive tree was symbolic of Zeus and associated with the mythological foundation of the ancient city of Athens. On the Acropolis, the site is still pointed out near the Erechtheion, where the sacred olive tree grew. When you next visit Athens -- seek out the Erechtheion, this masterpiece of Greek architecture. The olive tree currently adjacent to the Erechtheion, however, is recent. In fact, it was planted on February 22nd, 1917, by a Mr. Bert Hodge Hill -- an American living in Athens -- to commemorate George Washington's birthday. Gullible tourists today still listen to creative guides who spin the tale that the olive tree now growing there stems from antiquity.

I only wish it were so.

For centuries the olive branch served as a symbol of peace. The olive branch was identified further as a symbol of "safe travel," an association which commemorates the twig and leaves that Noah's dove brought back to the Ark from Mount Ararat. It is, perhaps, less widely known that victors in the Olympic Games originally were crowned with wreaths of olive, not laurel. In both Christianity and Islam, the olive branch represents the emblem of the Archangel Gabrielle. In Christian mythology the pale color of olive leaves reportedly was caused because Christ's glory once shone on them during the transfiguration.

Olive, of course, is an Old World food (the old world being defined as Africa, Asia, and Europe; in contrast to the New World, defined as North, Central, and South America and the Caribbean). Introduction of the olive into the New World and to the Americas dates from the 16th century. The best account of this botanical transfer stems from documents that describe the conquest and settlement of Peru, especially the report by

Garcilaso de la Vega. Garcilaso was a native of Cuzco, and son of a Conquistador and an Inca princes. Here is his passage regarding the olive:

"[in 1560] Don Antonia de Ribera... took with him [to Peru] some young olive plants from Seville, but in spite of every precaution only three were still alive when he reached Lima... He planted these three survivors... where he had already produced grapes, figs, pomegranates, melons, oranges, limes, and other fruits and vegetables from Spain... Don Antonio de Ribera planted the olives... and surrounded them with a great army of more than a hundred Negroes and thirty [watch] dogs who [protected] his precious cuttings night and day so that not even a leaf could be removed and planted elsewhere... But it happened that someone was wider awake than the dogs, or else managed to [bribe] the [guards]... one night one of the trees was spirited away, to make its appearance a few days later in Chile, six hundred leagues from Lima, where it propagated so successfully for three years that every shoot that was taken from it, however small, soon developed into a fine tree... At the end of three years [after many complaints] the migrant tree was returned to [Don Antonio] and appeared in the very place from which it had been removed, and was restored with such skill and secrecy that he never found out who had taken it, or who had returned it. In Chile the olives flourished better than in Peru...In Peru this tree grows better in the mountains than in the coastal plain. At first three olives, no more, were offered to a guest as a great feast and a tremendous display of luxury. Now oil has been imported from Chile to Peru."

Let me turn now to the second issue of importance today -- wine.

Wine certainly links dietary and cuisine patterns of the Mediterranean and Northern California. First, I will address several cultural-related issues associated with wine, then document for you several historical accounts relating how the Old World grapevine, <u>Vitis vinifera</u>, first appeared in the New World. I will conclude my presentation with several wine-related observations.

The grapevine, <u>Vitis vinifera</u>, was domesticated c. 8,000 B.C. in eastern Turkey. Writing in ancient Egypt begins in 3200 B.C. and already wine was being manufactured along the valley of the Nile. We know this because the winepress was an early hieroglyph.

Study of Ancient Egyptian hieroglyphs reveals specialized terms for grapes (<u>irp</u>), raisins (<u>wnsy</u>), grapevines (<u>i3rr.t</u>), and winepress (<u>smu</u>), while the Egyptian deity, <u>Rnwt.t/Rnn.t</u>, one goddess of harvest, often is depicted presiding over vines and vineyards. Numerous examples of grapes (long since dried into raisins) and faience grape clusters have been found in ancient Egyptian tombs. Sealed jars of wine, long since evaporated, have been found that date to c. 3000 B.C.

Expressed juice was strained, the fluid sometimes decanted into containers. When fermentation was completed, wine vessels were sealed, officials stamped the wine jars with the year of the king's rule, wine district, name of the wine, and sometimes the name of the gardener. Safety holes drilled in the neck of the amphora prevented bursting. Sometime during the process, wines were tasted, evaluated, and graded.

Ancient Egyptians used wine medicinally; both internal and external applications are known. Externally, wine lees were a common ingredient in ointments. Wine was drunk, medicinally, to regulate urine, and to kill tapeworm; medicated wines were sometimes administered during childbirth. Consumption of wine was specifically encouraged to treat loss of appetite or anorexia: in the <u>Papyrus Ebers</u>, eight of ten prescriptions for anorexia include alcohol. Of these eight, wine is the single ingredient in three, beer mixed with wine is the recipe of one.

If we leave Ancient Egypt and turn our attention northward across the Mediterranean to Ancient Greece, we can examine wine in the writing of Hippocrates of Cos, texts that date to B.C. 460-377. Here we see that treatment of wine in the Hippocratic texts fits four general categories:

- 1) wine in health maintenance,
- 2) commentaries on the selection of specific therapeutic wines,
- 3) wine and treatment of specific diseases, and
- 4) contra-indications for wine use.

Hippocrates wrote how wine consumption should be linked with specific seasons, that wine had specific contributions to make to diet, and how regular wine drinking in moderation protected against specific diseases and medical conditions. He says

"Infants should be bathed for long periods in warm water and given their wine diluted and not at all cold. This should be done to prevent the occurrence of convulsions and to make the children grow and get good complexions."

Hippocrates also argued the relative benefits of wine to patients, and commented upon difficulties encountered by physicians who faced a variety of choices when prescribing wines for specific disorders:

"Sweet wine is less likely to produce headache than is heavy wine, it makes less effect upon the mind and, as regards the internal organs, it is more easily passed than the other but causes enlargement of the spleen and liver."

The therapeutic role of wine is identified in numerous passages where Hippocrates identified and described various foods that were complementary with wine, and commented on aggressive therapy used to treat a wide range of eastern Mediterranean diseases and medical complaints.

Regarding anorexia, chronic fatigue, and exhaustion he wrote:

"Those who eat only once a day become exhausted and weak, and pass warm urine on account of their abnormal emptiness...With their food, let them drink wine in a reasonable amount and quite dilute, and after dinner walk a little until urine runs down and is passed."

Regarding emaciation:

"A hot bath should be followed by drinking half a pint of neat wine after which a meal of any kind of food should be taken, but no drink is taken with the meal or after it. Wait as long as it takes to walk [approximately a mile] and then administer a mixture of three wines, a bitter, a sweet, and an acid one, at first neat in small doses at long intervals and then more diluted in larger doses and more frequently."

As to obesity, Hippocrates used wine in several approaches to treatment. He writes, for example:

"Fat people who want to reduce should take their exercise on an empty stomach and sit down to their food out of breath.... They should before eating drink some diluted wine, not too cold, and their meat should be dished up with sesame seeds or seasoning and such-like things.... Those who are fat... should vomit on an empty stomach after a run or a brisk walk about the middle of the day -- [because] -- fat melts, from the burning heat of the phlegm, and becomes water... It benefits the patient if you dry out his cavity by giving him fresh warm dark whole-wheat bread, and as main dish the meat of ass, mature dog, swine and sheep, these very fat and boiled, or meat of fowl, roasted and warm; also let him eat polyp boiled in dry dark wine; let him drink dark wine that is very thick and sour."

Galen of Pergamum, A.D. 131-201, was a physician who investigated an especially interesting use of wine in healing and its role in human protection. Throughout the eastern Mediterranean wine frequently was mixed with <u>terra sigillata</u>, or clay tablets embossed with an image or icon of <u>Ge</u>, the ancient Mediterranean earth mother. After the fall of the ancient religions and rise of Christianity, <u>terra sigillata</u> tablets were stamped with an icon of the Virgin Mary, or of Jesus -- such as tablets such like this one -- used today in Mexico and in parts of California. These tablets are procured from vendors, then crushed and mixed with water or with wine, and the fluid drunk.

Plato of Athens, B.C. 430-347 wrote that wine was wasted on youth and should be reserved for the elderly. According to Plato....

"Boys under eighteen [should] not taste wine at all... wine in moderation may be tasted until one is thirty years old... but when a man is entering upon his fortieth year he... may... call upon Dionysus to join the old men's holy rite... [for]... wine is the cure for the crabbiness of old age, whereby we may renew our youth and enjoy forgetfulness of despair." Pliny of Verona, A.D. 23-79, noted both the dark and light behavioral ides to wine pleasure, as well as gender discrimination. He writes:

"At Rome women were not allowed to drink [wine]... the wife of Egnatius Maetennus was clubbed to death by her husband for drinking wine from the vat, and [he was] acquitted... A matron was starved to death by her relatives for having broken open the casket containing the keys of the wine-cellar; and Cato says that the reason why women are kissed by their male relations is to know whether they smell of 'tipple.'

Plutarchus of Chaeronea, A.D. 46-127 was an observer of social behavior and commented frequently on wine. In a delightful passage he explained that music was invented to bring order to riotous, drunken banquets. He also identified the three most important beverages of his time:

"Milk [while a beverage] ought not be used as [such] but as a food [one that] possesses solid and nourishing power; wine is the most beneficial of beverages... [and] in the course of the daily routine [one should drink] two or three glasses of water."

Wine produced from <u>Vitis vinifera</u> was a product of the Old World and not manufactured in the New World before 1492. The earliest account of the introduction of grape vines to the New World predates 1555, and to my knowledge the location of introduction was Peru. This report stems from Garcilaso de la Vega, who we already encounted in his description of olive. Garcilaso described the transition period between the Inca Empire and Spanish conquest; he also left Peru as a young man and produced an extraordinary account of Spanish activities in Florida. His books were published in Spain, in the year 1609, when he was quite elderly. He writes...

"The honor of introducing the plant of Noah [grape vine] [to Peru] belongs to Francisco Caravantes...[who] brought black-grape vines from the Canaries. Thus almost all the grapes were dark, and the wine is all claret and not completely red. Although other vines have been introduced since, and even muscatels, there is still no white vine... A [local] Spaniard... made a nursery of seedlings from currants brought from Spain,

and that a few of the seeds of the currants germinated and produced shoots... the currants happened to be from black grapes, so all the wine in Peru has turned out red or claret."

He continues:

"The first to grow grapes and bring them into the city of Cuzco was Captain Bartolomé de Terrazas, one of the first conquerors of Peru [withPizarro]... I knew this gentleman... [he planted grapes on his land] and in 1555 he showed the fruits of his labors [and sent] thirty Indians laden with splendid grapes to my [father]... I enjoyed my full share of the grapes, for my father chose me as ambassador for Captain Terrazas, and I and two Indian pages carried two bowls of them to each of the principal houses."

Garcilaso de la Vega provides the reason and rationale why Old World foods were imported to the New World, and reports:

"The Catholic monarchs and the emperor Charles V had offered as a reward from the royal treasury to the first person who newly introduced into any Spanish colony a Spanish crop such as wheat, barley, wine, or olive oil, and produced a specific quantity of it... these rewards [were enough] to stimulate Spaniards to cultivate the land and bring in such Spanish crops as were not found there..."

He identifies a Spaniard, one Pedro López de Cazalla, who lived 9 leagues from Cuzco:

"[He] did not wish to make wine out of covetousness for the sake of the prize, for he could have sold the grapes for much more than its value, but simply to have the honor and fame of becoming the first to produce wine from his own vineyards in Cuzco. Other Peruvian cities, such as Huamanga and Ara-quipa had wine much earlier, and it was all claret... Vines are irrigated everywhere in Peru... it is therefore not surprising that the seasons have their effect on plants and crops at any month in the year according to whether water is supplied or not... Until 1560, when I left Cuzco... it was not usual for the ve-cinos --[or Spaniards who own Indian

slaves]-- to give table wine to ordinary guests, unless they needed it for their health. In those days wine drinking seemed rather a luxury than a necessity [because] the Spaniards had won [the Inca] empire without the aid of wine or similar comforts."

Garcilaso de la Vega concludes his record of grapevines in Peru with the following passage:

"In 1544 and 1555 there was a great shortage of [wine] everywhere in Peru. In Lima it grew so scarce that there was none even to say mass with."

Thirty years later, accounts of grapes first appear in English as a result of exploration of the east coast of North America. Arthur Barlow, writing in 1584, describes the first English voyages made along the coast of America, a geographical zone that would be re-named Virginia. At an area probably just off the Carolina Banks, he writes:

"Wee viewed the lande about vs being very sandie, and lowe towards the water side, but so full of grapes as the very beating, and surve of the Sea ouerflowed them, of which we founde such plentie, as well there, as in all places else, both on the sande, and on the greene soile on the hills, as in the plaines, as well on euery little shrubbe, as also climing towardes the toppes of the high Cedars, that I thinke in all the world the like aboundance."

These, of course, were native, wild North American grape species, not Vitis vinifera.

Richard Hakluyt, writing a year later in 1585, commented on the inducements for making the difficult, risky voyage from England to the new lands of Virginia. He provided a list of 31 reasons, two or which were for the glory of God, and emigration as a way to deal with unemployment which was rampant in England at the time. Hakluyt writes how young, male immigrants could solve the labor problem by cultivating grain and planting vines in the rich soil of Virginia, or by tending native vines that grew in the New World in abundance.

Hakluyt described the manner for introducing and producing grapes and wine in the Americas:

"As for wine... in setting your vine-plants [in] this yeere of 1585, you may haue Wine within three yeeres. And it may be that the wilde Vines growing there already [in America], by orderly pruning and dressing at yhour first arriuall, may come to profit in shorter time."

Hakluyt wrote, further, on his expectation that the natural people, or Native Americans of Virginia, could be made to be skillful in planting grapes, which would make England economically independent from Italy, Spain, and the Spanish islands from where the English imported their wine and olive oil.

Haklyut describes how "cuts of vnrooted [vines] should be placed in tubbes of earth shipped at the next voyage, to be planted in Virginia, along with Oliue trees, sugar cane, figs, along with pigs" -- animals that would feed on local acorns and roots.

Haklyut was perceptive and cautioned about instituting war with the Native Americans, because of potential trade benefits, and writes:

"If seeking reunge on euery iniurie of the Saluages we seeke blood and raise war, [then] our Vines, our Oliues, our Figge trees, our Sugar-canes, our Orenges and Limons, Corne, Cattell, will be destroyed, and trade of merchandise in all things ouerthrowen; and so [what] the English nation there planted and to be planted, shalbe rooted out with sword and hunger."

In the time that remains, let me conclude with thoughts and comments regarding food, wine, and immigration to California.

The first descriptive exploration account of California in English of California is that by Francis Drake in 1628. The passage is unremarkable, and contains only a very brief, incomplete description of California Native Americans. Drake describes few customs associated with food and eating, mentioning only deer and rodents. He makes no mention of local fruits, berries, or traditional beverages used by the Indians.

The geographyer Harm de Blij writes that <u>Vitis vinifera</u>, or the European grape, was introduced to the Americas by members of the Cortés expedition (1519-1526), but one must take this early date with caution. Only after the military situation had stabilized, would it have made sense to import grape vines. One should look, therefore, to the years after 1526, and probably to the next decade.

Certainly by the middle of the 16th century, grapes and wine production had been established in the central highlands of Mexico, and later would be spread by colonists and missionaries to other localities. So successful were these vine plantations in the New World, that King Philip II issued a decree in 1595 that forbid any further planting of grapevines in the Spanish colonies of the Americas. Exempted, however, were the Dominican, Franciscan, and Jesuit Catholic orders -- who would become keepers of the wine industry in the 17th and 18th centuries.

Wine from <u>Vitis vinifera</u> spread northward ultimately to California. First grapes were planted at the Franciscan mission of San Diego in 1769; sixty-four years later in 1823, grapes were planted in the northern-most mission, San Francisco Solano, located in Sonoma county north of the modern city of San Francisco. With the decline of the mission system -- there was a parallel decline in vineyard care and wine production declined.

Wine needs associated with the gold rush and the era of the '49ers was supplied primarily from Los Angeles through the efforts of William Wolfskill. Need for wine continued to grow; the market expanded; economic forces stimulated local viticulture in Sonoma and Napa valleys. As a result California vilticulture thrived in the 1850's especially after arrival of Agoston Haraszthy, who urged the testing of various grape varieties. Indeed Haraszthy is widely recognized as the "father" of the California wine industry.

The success of both olives and grapes in California is because California and the Mediterranean are linked -- geographically -- in a variety of ways, due to similarities in climate, quality soils, and agricultural potential. It is not accidental that Greeks and Italians settled in California; Armenians in Fresno; Iranians, Syrians, and Turks in Merced, Turlock, and other communities in the central valley of California.

Students of California history recognize several distinctive agricultural districts within the state, some more or less favorable to specific types and varieties of grapevine root stock. The micro-climates north of San Francisco in the Napa and Sonoma regions, coupled with rich volcanic and alluvial soils, permit the cultivation and tending of vines with an annual economic return -- from all sectors -- from wine, from tourism, from wine-related activities -- of several billions of dollars. The warmer, less moist geographical regions south of San Francisco, and within the central valley of California, permit complementary production of different varieties -- also with extraordinary economic return.

Wine initially produced in California was for the Catholic, Christian mass. Could the Franciscans and subsequent orders ever have perceived the quality and extent of wine production in California today? The Italians who immigrated to north-central California, whether from Lombardi, the Piedmont, or elsewhere in the Italian peninsula -- these immigrants played a prominent role in the proliferation of planting, and the development of quality in wine production. But it is also to the vision and perceptions of others -- for example Robert Mondavi, and others associated with the American Institute of Wine and Food -- who have been influential in demonstrating and promoting the quality of wines produced in California, for linking the foods of California with wine, and for promoting further the joys contained therein.

I recall that it was Becker and de Luca, writing independently in 1979, who related that wine is a "chemical symphony," "bottled poetry," "captured sunshine," "the milk of old age," and "the gift of God."

In recent decades California has developed a distinctive cuisine pattern. One characteristic of this pattern is the link with premium wines, products grown locally within the state -- wines that in 1996 are the quality products of <u>Vitis vinifera</u>, introduced to the New World -- so many centuries ago.

So let us thank the early Spanish visionaries, the Italians, the Greeks, the Lebanese, and numerous other Mediterranean immigrants to California -- for their contribution to quality beverages in California today.

And I thank you here, today, for this opportunity to meet with you.