Eat Wisely- Not the Bread You Want

There are two conditions which tend to make life in the Middle Ages “nasty, brutish, and short”, namely the prevalence of war and the continual threat of famine. Then of course, there’s your Black Death. Add to this one irregular, but terrifying outbreak of illness that staggered the imaginations of those afflicted and those who stood by, helpless to offer any kind of effectual aid.

The first occurrence of this epidemic was documented in Paris in 945. People began to feel queasy, then became violently ill, complaining of a burning sensation in their limbs, a precursor to the even more distressing loss of toes, fingers, hands and feet. They experienced hallucinations, some going permanently mad. Those who rushed to the Church of St. Mary were cared for by Duke Hugh, who happened to have bread on hand that was not tainted by ergot. Those who left and went home and resumed feeding on their own supplies were once again afflicted.

Strange as it now seems to us, no one quite put two and two together. Ergot poisoning, as we now recognize this unfortunate episode to be was then called “St. Anthony’s Fire”, after the Egyptian Desert Father whose spiritual life was marked by repeated temptations of a most exotic and hallucinatory character. The outbreaks were infrequent, but sometimes devastating. We are told that a Parisian outbreak in 1418 killed or severely incapacitated over 50,000 people. St. Anthony’s Fire was reported in France, Flanders, and Germany.

Ergot is a fungus that grows on rye. Ironically, the fungus can be used medically, and was recognized by herbalists as being helpful in bringing on childbirth. However, in large doses, the above mentioned maladies come into play- mental illness and a fatal gangrene being the harshest side effects. The ergot requires an exceptionally wet growing season in order to reach poisonous proportions, hence its episodic nature. From the mid eighteenth century to present there appear to have been fewer than ten outbreaks, and those largely contained. The last known case occurred in France in 1951. Another factor that might have limited
the number of outbreaks is improvements in dry storage areas, since ergot, like all fungal growth, need damp conditions in order to thrive.

With no knowledge of what the problem actually was until the late Renaissance, people implored the saints to help them, and although the bones of St. Martial appears to have halted at least one Parisian outbreak, the malady became the balliwick of St. Anthony, and a special order was founded in 1095 by a fortunate and grateful survivor. The order helped found and fund hospitals and St. Anthony became the patron of surgeons who amputated limbs as well as their patients.

It was fashionable among historians for a time to assert that the Romans were wise to the problems of ergot poisoning and that both Pliny and Columella wrote about it. Closer scrutiny does not actually bear this out, however. The Romans knew about rye, but it was not widely grown by them, and while both of the cited authors do mention specific growths on grain that cause problems, they do not mention the specific problems associated with ergotism, which is a striking oversight to say the least, and while Caeser does mention grain rot afflicting a stronghold of Celts he was beseiging, it could have easily been rotted old grain they were left with during the long seige, nor does Caeser mention anything more than the starvation that helped reduce them to submission. This does not sound like a case of ergotism.

That medieval dieticians and physicians should have remained silent on the topic is curious, but understandable in that no one actually connected the fungal growth of ergot during a cold wet spring, followed by a hot summer as being optimum conditions for creating a very undesirable condition. Moreover, rye itself is a grain not favored by the noble class, passed over in favor of wheat. Thus, it was the poor who most readily consumed the infected grain and paid the heaviest toll for doing so. And it is also clear that no one seemed to understand that the poisoning itself stemmed from the consumption of grain- or anything else.
Like plagues and miasmas, it was just another bane of existence that you hoped would not turn up on your personal list of misfortunes in this vale of tears.

Another curious aspect of St. Anthony's Fire is its practical absence from England- curious until one realizes that the wet English spring and summer is not (until very recently) accompanied by much heat, and so ergot would not flourish as such. There does seem to have been a few ergot infections reported in Denmark and Sweden, and later historians would speculate that this ergot poisoning was the source of the famed "berserker" outbursts. Others state that it was hallucinogenic mushrooms that drove the Vikings to this type of motivational overdrive. The problem with this line of speculation is that ergot poisoned people would not be in much condition to go attack other people- festering gangrene tends to be something of a depressant that way. As for the mushroom theory, this too, is a theory that is insubstantial to say the least. You don't have to get trippy to go get other people's stuff in a violent fashion- an excess of testosterone, a surfeit of mead, and a culture in which doing that sort of thing gets you good notice will suffice nicely.

So, to the medieval diner, this most lamentable of afflictions would not have occured as a problem connected with food whatsoever. To the well born diner, it simply wasn't a problem. Rye bread? Never touch the stuff, that's for the base born.

Sources:

*Ergot and Ergotism, A Monograph*  Barger, George; London, 1931


*Six Thousand Years of Bread*  Jacob, H.E. New York, 1945