THE WALL STREET JOURNAL.

HISTORICALLY SPEAKING | September 21, 2013

# The Ugly Arsenal of Poison and Pestilence

By AMANDA FOREMAN

There are two popular schools of thought about human existence. One argues that humanity is falling ever further from its original ideal state. The other claims to see a steady march toward enlightenment and self-improvement. Yet one only has to read about the chemical poisoning of civilians in Syria to know that our appetite for mass destruction remains no better or worse than it was at the dawn of civilization.

Poison gas as a military weapon is indelibly associated with World War I. The war poet Wilfred Owen witnessed its effects—"the white eyes writhing in his face…the blood come gargling"—and told the world that there was no honor and glory in war. He believed his generation had been tricked into fighting for "the old Lie."

But Owen was late to the game. The Old Testament is filled with examples of biological warfare—for example, the 10 Plagues of Egypt. By the 13th century B.C., everyone was looking for that extra advantage against the enemy. The Chinese were experts at producing toxic smoke. The Hittites used plague-carrying donkeys to infect hostile territory. As for the ancient Greeks, in 585 B.C., Cleisthenes of Sicyon ended the siege of Kirrha by leaking extract of the hellebore plant into the city's water pipes. The defenders were so weakened by diarrhea that the besiegers walked in without resistance.

The Romans were the first to denounce chemical warfare, declaring "*armis bella non venenis geri*": War is fought with weapons, not with poisons. But confronted by such ingenious weapons as live scorpion bombs and poisoned arrows, Roman generals had no compunction against using fire, insects, toxins and whatever else came to hand. The early Europeans were similarly ambivalent. Germ warfare against Christians was a terrible thing, but against infidels was another matter.

The day of reckoning came in the 14th century, when the bubonic plague, popularly known as the Black Death, spread from China to the West. By 1347 the plague had reached Sicily. It was only a matter of time before carriers of the disease took it to other parts of Italy and then to the rest of Europe. But the following year the plague received a massive helping hand from the residents of Kaffa, (now Feodosiya, Ukraine). This bustling seaport on the Crimean Peninsula was nominally under Mongolian control, but in practice it was administered by Italian traders under license. In 1345 an unfortunate dispute had led to violence, then to conflict, and finally to a siege of the city led by the Mongolian general Janiberg.
The siege had not been going well for the Mongolians when the Black Death suddenly swept through Janiberg's encampment in 1346. Faced with thousands of putrid bodies, the general dealt simultaneously with his burial problem and the intransigence of

the Kaffans by catapulting the dead into the city. The results were swift and calamitous. The terrified Italians fled the city, taking the plague to wherever they had friends, relatives and business contacts to receive them. By the time civic leaders understood the threat coming from Kaffa, it was too late to do anything about it.

At least 75 million people across three continents died from the Black Death. Europe's population shrunk by a third. Yet the lessons learned from the catastrophe can be judged by the example of the Spanish during the 1494 Italian War. Growing impatient with conventional means, they resorted to adulterating the local wine with the blood of leprosy victims. Some things really don't change.

*A version of this article appeared September 21, 2013, on page C12 in the U.S. edition of The Wall Street Journal, with the headline: The Ugly Arsenal of Poison and Pestilence.*