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Title: Iron Production Technologies during the Late Ottoman Period: Archaeometallurgical Studies at Demirköy in Turkish Thrace

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Abstract:

Iron like copper, bronze, gold and silver was another important innovation of ancient Anatolian cultures. Even though the earliest iron artifacts from archaeological context date back to the 3rd millennium BC, its major production and utilization date to the beginnings of the 1st millennium BC. It became the crucial material for the production of weapons as well as agricultural and domestic tools. Ancient iron masters were able to understand the inner structure of iron types such as wrought iron, cast iron and steel to produce the right combination for the desired product. In this seminar after a brief introduction to the ancient history of iron and iron technology, I will try to present the preliminary results of a multidisciplinary project which involves several universities and institutions. The project is the archaeometallurgical investigations focused on the mining and smelting activities around Kırklareli, Demirköy in the Turkish Thrace that was a major iron-producing center during the Late Ottoman Period. Chemical and metallurgical investigation of materials recovered from the site indicates that both cast iron and bloom iron were produced. Cast iron was produced in “Stückofen” where as wrought iron was produced in smaller bloomery furnaces. There are indications that the metallurgical activities in the region may extend far back into prehistory. The study will document the Iron technologies utilized during the Ottoman period.