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The Impact of World War I on the Sciences¹

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Many, perhaps most, maybe even all great technological advances have come out of wars. WWI is no exception. Everyone remembers poison gases (though even they have more peaceful applications in pest control). But medicine also benefitted - reconstructive surgery, X-ray techniques, blood transfusion, and the interpretation and treatment of shell shock. Archaeology benefitted from airborne reconnaissance; astronomy from the development of infrared sensitive photographic emulsions; physics from acoustic studies and the bare beginnings of radar; meteorology from better sharing of long-range (in time and space) data; and many others. The war surely contributed to the outbreak of influenza in 1918-19 ("Spanish" only because their data were not censored) and to interventions now in use. Stepping back further, we see that literature, (my favorite is the poem "Naming of Parts"), music, representational and non-representational art, the role of women in society, were changed; indeed nothing emerged unchanged. And, of course, WWI was the primary cause of World War II. Officers' caps, on the other hand, looks just the same today as they did in 1917, but airplanes and tanks are very different.

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