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origins of Wedderburn’s theorem

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Wedderburn and Dickson both published independent proofs of the fact in 1905. Wedderburn's publication contains three proofs, the first of which was ultimately flawed. The second two proofs improve the essential trick of Dickson by using Zsigmondy's theorem, a numerical condition on prime factors of $p^n - 1$. Wedderburn and Dickson were colleagues at the University of Chicago at the time.

The first, mistaken proof, of Wedderburn was later corrected and simplified by Artin and is now the standard proof in most texts.

References

- [1] Parshall, Karen Hunger *In pursuit of the finite division algebra theorem and beyond: Joseph H. M. Wedderburn, Leonard E. Dickson, and Oswald Veblen*, Arch. Internat. Hist. Sci., 33, (1984), 111, pp. 274 – 299.