NOTES ON THE CONTENTS OF SOME OF THE ARMOURIES IN
THE SWISS ARSENALS.

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The common handbooks of Switzerland allude slightly to
the collections of old weapons and armour which are to
be seen in the capitals of several of the cantons, but they
are so little known to tourists in general, that I will en-
deavour to embody in this short paper a few notes taken
on different visits, in the hope that Archaeologists may spare
a few hours from the great attractions of nature, to inquire
their way to the State Arsenals (not always easy to discover)
and make these collections the subject of a more deliberate
and critical examination—for which every facility is given
by the old soldiers in charge of them.

The great quantity of genuine weapons of the fifteenth
century, relics of the Burgundian wars, will attract the first
attention: they are derived from the fields of Grandson and
Morat, 1475—6, in which the chivalry of Charles le Témé-
aire suffered such signal defeat at the hands of the patriot
levies; but we find early fire-arms, rifles, breech-loading
cannon, arms, armour, and articles of equipment of all periods,
often in quantities which make the collections armouries
rather than museums. An Austrian breech-loading field-
piece at Zurich, dated 1611, bears the quaint inscription—

Ich Bin ein junft frau
Wel gestalt Melsen
Ich lisse der wirt mit Alt.

Freely translated,

I am a maiden fair and bold,
Who tastes my kisses grows not old.

It is rifled in 18 grooves, calibre 1·86 in., length 6 ft., and
has a somewhat unusual breech mechanism. The end of the
barrel is closed by a plug, which is hollowed to contain
the charge of powder, and fixed in its place by a strong lateral bolt that passes through both sides of the gun. Another piece, dated 1674, is curiously contrived "a double debt to pay." Like Caliban it hath two voices, the cascable or breech end is a little prolonged beyond the usual dimensions, and, being bored out, discharges a shell, like a mortar. Here too those philosophers who delight in proclaiming that "there is nothing new under the sun," will be confirmed by finding a breech-loading rifled gun dated 1614, in which the breech is closed by a moveable block with the vent in it, somewhat like the Armstrong system. It is also a poly-groove, in the jargon of the present day, having 31 grooves, calibre 0·95 in.; another recent proposal was anticipated by a piece called an **Orgue**, bearing the date 1742, and the name **Johanes Weller, auctor et inventor**, in which ten chambers arranged in a straight transverse block are brought in succession to the barrel by moving a winch, an idea since more elegantly worked out in the common American revolver. The earliest dated rifled harquebus which I could discover is only of 1607. It is rifled in 34 fine angular grooves, calibre 0·65, barrel 49·6 in. long, the lock a combination of wheel and match. There is another of 1621. (Fig. 2.) Few visitors will see unmoved in this collection the arms worn, or said to have been worn, by Ulric Zuingle when
slain in 1531; namely, a straight two-edged sword, and a battle-axe which testifies to his advanced ideas in secular no less than theological subjects, for it is bored out to make it at the same time a fire-arm—a combination not uncommon in Oriental weapons, but a very bad one. The lock is wanting. Perhaps more genuine, and also very interesting, is a complete buff suit of a Swedish Rittmeister of the period of Gustavus, about 1650. He carries a rifled carbine.

We find in this collection a large number of marteaux or horsemen's hammers of a peculiar type, intended to be carried at the belt. They would appear to have been specifically made for penetrating the joints of armour, being too light to inflict much injury through it. The annexed cut represents one. Among the plug and socket bayonets are several of unusual forms. As for huge two-handed swords, morgensterns, partizans, and halberts of every type, the walls are loaded with them, and doubtless a minute examination would furnish dates and marks of real interest.

The collection at Lucerne is smaller. A portion of the robe of Queen Agnes of Hungary, of the early part of the fourteenth century, is preserved here, labelled, "Portio modica vestium Reginæ Agnetis in monasterio Kœnigsfelden sepultæ e flavo et nigro variegata." And, like the very fine Byzantine silk of the sixth or seventh century at Chur, it is highly worth the attention of any one interested in textile fabrics. But the arms are not so fine as those at Zurich. It exhibits, however, a very fine sword, bearing the name H. IOHANES SCHRICKE and the motto IST GOT MIT VNS VER WIL VIDER VNS. 1529: the hilt is a beautiful work of art, and it comes from a family which claimed to be descended from William Tell. Those who deny William Tell's his-
torical existence will perhaps not accept this as a proof of it. We find here, further, a great number of cross-bows, with arrows in bundles, and, as usual, the great Swiss two-handed swords of the sixteenth century, one of them dated 1584; others, which are long-handled but scarcely two-handed, bear that unexplained inscription ΑΝΝΗΜΗ, which has puzzled so many collectors. There are here but few fire-arms, but among them is a richly decorated wheel-lock dag rifled in eight grooves, of the beginning of the seventeenth century.

We may now proceed to Berne, the only one of the collections of which any catalogue has been printed. The punishment of decapitation was continued in some of the Swiss Cantons to within these few years, and one of the first objects in this museum is an array of headsman’s swords, each of which is affirmed to have cut off 100 heads. The number has a poetical completeness about it, which suggests a doubt of its literal truth. It is asserted to have been customary, when a sword had completed that tale, to set it aside. We have here a rare variety of the two-hand weapon—a curved sabre with flamboyant edge. The ordinary two-hand swords of the sixteenth century are very numerous.

The collection contains several suits of armour, one of them attributed to Berchthold von Zöhringen, by whom the
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City of Berne was founded in 1346. It is evidently of a much later period, probably of the succeeding century; there are several suits of the sixteenth century, and one, which was discovered in the hollow of an old oak tree on the Bramberg, may date from even the fourteenth. It is believed to be a relic of the battle of Laupen.

Among the fire-arms we find a "hand-gonne" of the fourteenth century on its oaken stock in excellent preservation, and a considerable number of early breech-loading rifled pieces, several of which exhibit the germs of mechanical contrivances which have been the subject of modern patents. The subjoined woodcuts show the rifling of two of them, of the seventeenth century. (Figs. 4, 5.)

As the thumbscrews and instruments of punishment of the Spanish Armada are still preserved in the Tower, and still kindle the fire of patriotic resistance in the breasts of untutored visitors, so are preserved here 750 halters, each from the saddle-bow of a different Burgundian knight, and each destined, if popular tradition may be trusted, to hang a prisoner.

It was from this collection that, thanks to the courtesy and friendly interest of H. B. M. Envoy and Minister, Admiral the Hon. E. J. Harris, and through the mediation of Mr. Albert Way, we received the four morgensterns which were exhibited to the Institute in November, 1867, and are now in the Museum of Artillery. There are still eighty of them at Berne. This very favourite weapon of the Swiss is to be found in all the collections, and in a great variety of forms; but it is seldom met with in English collections. Our examples consist of a strong oak staff, 7 ft. long, with an enlargement at the head, where it is set round with square spikes and armed with a long point. (Fig. 6.)

Weapons of this character must have been of little use against an active opponent, and especially weak in defence. Their value was to deliver a crushing blow from a position of superiority, as in the defence of a breach, and upon assailants so encumbered with their own armour as to be disabled from deriving advantage from the difficulty the wielders must have experienced in recovering them. Considered from this point of view, they have, like all long-handled striking weapons, an interest of their own. They recall to us an age of personal combat and personal equipment, to which no-
thing analogous exists, and in consequence they are nearly the only weapons which have no living analogues. The lance and the sword hold their ground; the halbert, the morgenstern, the bill, in all their grisly varieties, have disappeared from civilised, and almost from uncivilised warfare. It is only in China that we still find travesties of them—borne apparently for parade, not for use. The mace and battle-axe linger among the wilder horsemen of Western Asia, but it is easy to see that their days are numbered.

I am unwilling to close this brief note without expressing a hope that the liberality of the Municipality of Berne may find imitators. Nothing would so much extend the interest of all collections of arms, especially those of different countries, as a free interchange of redundant specimens; for what is very rare in one country is often common in another; and it is a mistake to rest the credit of any public collection on its accumulation of certain objects. It may, indeed, almost be affirmed, that a public collection has no business with duplicates; they are not wanted, and represent objects which are wanted, and might be obtained by exchange. These are principles not likely to commend themselves to ardent collectors; but perhaps those who look on all Museums as primarily subservient to public education will see some force in them.