# THE REPTILES AND AMPHIBIANS OF POLAND

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#### INTRODUCTION

Poland seems to have been somewhat negleted in many of the books published in English concerning the European herpetofauna. Specific references to the country are few and distribution maps for species often at the edges of their ranges are often vague. This is in spite of the fact that for some years Poland has been one of the more accessible of the Eastern European countries and one in which the availability of current vernacular literature reflects public interest in reptiles and amphibians. (Polish people do not, I find, think you crazy when you tell them you have come to their country to look for newts!) In this short article I intend to give an introduction to Polish herpetology, drawing where possible on my own experience from visits to the country as well as on relevant publications. An annotated check-list of the native species is given, using the format: Latin name/English name/Polish name.

## THE COUNTRY

Poland is a country which is almost a third as large again as the United Kingdom but which has little more than half the population. In the south and west, undustrialized areas such as Silesia border similar areas of Czechoslovakia and Germany, creating a pollution problem that threatens to make some districts uninhabitable. On the other hand, low-technology agriculture and a claim to more wilderness than any other country in Europe mean that Poland has very much an unspoilt feel to it. The south of the country is mountainous (the Carpathians run from Poland, south through the Ukraine and Czechoslovakia, to Romania), with the North European Plain comprising the rest of the area northwards to the Baltic Sea. In the west and elsewhere are further ranges of hills and mountains, and to the east are extensive marshes. In the north, sand-dunes back on to more marshes and lakes and, even at the height of summer, parts of the sea are fresh enough to support freshwater fish. Much of the north-east is very low-lying, even below sea-level in places, with a vast number of lakes resulting from past glacial activity. In the south-east, where a small part of Poland is squeezed between Czechoslovakia and the Soviet Union, the mountains seem more like large hills, with tree cover to the summits in many cases. Forest of all types is characteristic of Poland. Rivers such as the Oder and the Vistula run roughly south to north, with their tributaries the Warthe and the Bug running east to west to join them. The Central European climate means that long, hot summers and very cold winters are to be expected.

#### SPECIES LIST

Amphibia/Amphibians/Pazy

## URODELA/NEWTS AND SALAMANDERS/PAZY OGONIASTE

#### Triturus cristatus/Crested Newt/Trszka grzebieniasta

Found throughout Poland with the exception of some mountainous areas but considered to be decreasing as elsewhere in Europe.

Triturus vulgaris/Smooth Newt/Traszka zwyczajna

The common newt of Poland, subspecies vulgaris being found in most parts of the country.

#### Triturus alpestris/Alpine Newt/raszka gorska

Found in the south and south-west only but not restricted to the mountains. I have found well-grown tadpoles in a small concrete reservoir at Zakopane, a mountain/ski resort in the south. Subspecies *alpestris* is the only one present.

#### Triturus montandoni/Carpathian Newt/Traszka karpacka

Mountains of the extreme south. In the south-east I have found this newt in great abundance, occupying every kind of fish-free water from woodland ponds to temporary puddles and the running water of small roadside ditches. In these places it was the only newt species but, in the relatively few places where it can be found alongside the Smooth Newt, hybrids can make up 60% of the population. Even in breeding condition, this species is characterized by a rough-feeling skin. An albino larva has grown to a size beyond that at which metamorphosis would normaly take place and has over-wintered in this condition. (I am not aware of this phenomenon having previously been recorded for this species).

#### Salamandrà salamandra/Fire Salamander/Salamandra plamista

Very largely restricted to the mountains of the south and south-west. While searching for the previous species, I was told by locals that salamanders would be much easier to find, especially if it rained. In the absence of rain, I saw no adults, but larvae were not difficult to spot in pools beneath tiny waterfalls. I would suggest that Polish salamanders are mainly of the subspecies *salamandra* in the south, with *terrestris* found west of the Oder.

# ANURA/FROGS AND TOADS/PAZY BEZOGONOWE

## Bombina bombina/Fire-bellied Toad/Kumak nizinny

Found throughout the lowlands but largely absent from the mountainous south. Where its range overlaps that of the following species, hybrids are well-known.

# Bombina variegata/Yellow-bellied Toad/Kumak górski

Subspecies *variegata* is restricted to the south where I have found it alongside the Carpathian newt in all but the most shaded of waters. In places it is extremely abundant and its tadpoles blacken the water of puddles which are often destined to dry out.

# Pelobates fuscus/Spade-foot Toad/Grzebiuszka ziemńa

Subspecies fuscus is found everywhere with the exception of some of the mountainous regions of the south.

# Bufo bufo/Common Toad/Ropucha szara

Found throughout the country. In the south-east I have seen pairs breeding in May and June in large, fast-flowing mountain streams, surrounded by shoals of minnows, as well as in tiny, running ditches. Also plentiful in marshes behind the dunes in the north. Subspecies *bufo*.

#### Bufo viridis/Green Toad/Ropucha zielona

Subspecies viridis is found in all parts.

#### Bufo calamita/Natterjack Toad/Ropucha paskówka

The distribution is less certain than for the previous species, but it seems likely that there are colonies in most parts of the country, with the exception of the far south.

#### Hyla arborea/Common Tree Frog/Rzekotka drzewna

Well-known and more or less ubiquitous, a colony I encountered in the west is based on a pond in the middle of a building-site and is certain to be destroyed.

# Rana "esculenta"/Edible Frog/Zaba wodna

#### Rana ridibunda/Marsh Frog/Zaba śmieszka

# Rana lesonae/Pool Frog/Zaba jeziorkowa

Green frogs are to be found in any extensive body of water, whether at the edges of lakes or in networks of drainage ditches, and even in town park ponds. I have also found them in quite small, swift lowland streams with fish such as Gudgeon. The Marsh Frog (subspecies *ridibunda*) is less likely than the others to be found in the southern mountains.

# Rana temporaria/Common Frog/Zaba trawna

Found everywhere, this seems to me to be the most common ranid in the mountains. Subspecies *temporaria*.

#### Rana arvalis/Moor Frog/Zaba moczarova

Possibly the most common Brown frog over most of Poland, subspecies *arvalis* is probably only absent from the extreme south (where subspecies *wolterstorffi* may occur). It appears to be very common in small and isolated waters in the west. The specimens in the building-site pond mentioned above all had a distinct dorsal stripe.

## Rana dalmatina/Agile Frog/Zaba dalmatyńska

Only likely to occur in the extreme south-east. A colony may previously have existed on the Oder. Something of a mystery has surrounded this frog, as past identification of Polish specimens has often been in doubt and all individuals have been females. My first impression of frogs at the best-known site has been that they are indeed Agile Frogs, but subsequent closer inspection of characteristics such as relative leg-length has proved inconclusive.

#### Reptilia/Reptiles/Gady

TESTUDINES/TURTLES AND TORTOISES/ZÓLWIE

Emys orbicularis/European Pond Tortoise/Zolw blotny A number of colonies are widely scattered in lowland areas.

# SQUAMATA/LIZARDS AND SNAKES/JASZCZURKI I WEZE

Anguis fragilis/Slow-Worm/Padalec zwyczajny Subspecies fragilis is found in all parts.

Lacerta agilis/Sand Lizard/Jaszczurka zwinka

Subspecies agilis is found everywhere.

Lacerta viridis/Green Lizard/Jaszczurka zielona

#### Subspecies *viridis* is found only at one spot in the south.

Lacerta vivipara/Common Lizard/Jaszczurka zyworodna Found in all parts. I have most frequently encountered it as dark-coloured specimens in the mountains.

Natrix natrix/Grass Snake/Zaskroniec zwyczajny

Subspecies *natrix* is found in all parts of the country. I have seen it in water meadows where Moor Frogs are abundant.

Coronella austriaca/Smooth Snake/Gniewosz plamisty

Subspecies *austriaca* is found mainly in the south, with relatively few sites being reported for the central and northern areas.

#### Elaphe longissima/Aesculapian Snake/Waz Eskulapa

Subspecies *longissima* is restricted to the extreme south-east, where it is found in the vicinity of ruined dwellings. Illegal collection by visitors from the West, mostly Germans, is said to have depleted its numbers.

# Vipera berus/Adder/Zmija zygzakowata

Subspecies *berus* is found in all parts of the country. I have found specimens occupying rock crevices in alpine pasture.

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