Article X.—THE DECORATIVE ART OF THE INDIANS OF THE NORTH PACIFIC COAST.

By FRANZ BOAS.

It has been shown that the motives of the decorative art of many peoples developed largely from representations of animals. In course of time, forms that were originally realistic became more and more sketchy, and more and more distorted. Details, even large portions, of the subject so represented, were omitted, until finally the design attained a purely geometric character.

The decorative art of the Indians of the North Pacific Coast agrees with this oft-observed phenomenon in that its subjects are almost exclusively animals. It differs from other arts in that the process of conventionalizing has not led to the development of geometric designs, but that the parts of the animal body may still be recognized as such. The body of the animal, however, undergoes very fundamental changes in the arrangement and size of its parts. In the following paper I shall describe the characteristics of these changes, and discuss the mental attitude of the artist which led to their development.

In treating this subject, we must bear in mind that almost all the plastic art of the Indians of the North Pacific Coast is decorative art. While some primitive people—for instance, the Eskimo—produce carvings which serve no practical ends, but are purely works of art, all the works of the Indian artists of the region which we are considering serve at the same time a useful end; that is to say, the form of the object is given, and the subject to be represented is more or less subordinate to the object on which it is shown. Only in the cases of single totemic figures is the artist free to mould his subject without regard to such considerations; but, owing to the large size of such figures, he is limited by the cylindrical form of the trunk of the tree from which he carves his figures. We may therefore say that the native artist is in almost all his works limited by the shape of the object on which he represents his subject.

The plastic arts of the Indians are carving and painting, in which latter we may include tattooing and weaving. Carving is done mostly in wood, but also in stone and horn. It is either in the round, in bas-relief, or, although more rarely, in high relief. There is no art of pottery.

The artists have acquired a high technique, which proves that realistic representations of animals are not beyond their powers. The following are a few exquisite examples of realistic carvings. The helmet (Fig. 1) is decorated with the head of an old man affected with partial paralysis. Undoubtedly this specimen must be considered a portrait head. Nose, eyes, mouth, and the general expression, are highly characteristic. The mask (Fig. 2) represents a dving warrior. The artist has represented faithfully the wide lower jaw, the pentagonal face, and the strong nose of the Indian. The relaxing muscles of the mouth and tongue, the drooping evelids, and the motionless eveballs, mark the agonies of death. The conception is so realistic that the mask creates a ghastly impression. Fig. 3 represents a dancing hat decorated with the design of a seal. Fig. 4 is a small float representing a swimming puffin. Fig. 5 is a rattle in the form of a swimming goose. The characteristic bend of its neck and the characteristic color of head and neck are very true to nature.

In these cases the artist has rendered the form of his model faithfully. The object on which the representation of his model was placed allowed him the use of the figure without any altera-This is not often the case. Generally the object to be decorated has a certain given form to which the decoration must be subordinated, and the artist is confronted with the problem of how to adjust his subject to the form of the object to be decorated.

Before attempting an explanation of the method adopted by the artist in the solution of this problem, we must treat another aspect of our subject. We must premise that in consequence of the adaptation of the form to the decorative field, the native artist cannot attempt a realistic representation of his subject, but is often compelled to indicate only its main characteristics. consequence of the distortion of the animal body, due to its adaptation to various surfaces, it would be all but impossible to



Fig. 1.



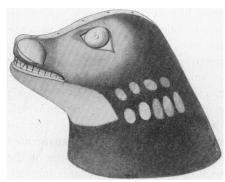




Fig. 3.



Fig. 5.

Fig. 1 $(\frac{1}{4\pi 3})$. Helmet with carving representing a paralytic man. Tribe, Tlingit. Height, 21.5 cm.; width, 28 cm.; depth, 28 cm.

Fig. 2 (2001). Mask representing a dying warrior, Tribe, Tlingit. Height, 24 cm.; width, 19 cm.; depth, 11 cm.

Fig. 3 (252). Dancing hat representing a seal. Tribe, Tlingit. Height, 21 cm.; width, 24 cm.; depth, 23 cm.
Fig. 4 (1757). Small float representing a swimming puffin. Tribe, Tlingit. Length, 6 cm.

Fig. 5 (300). Rattle representing a goose. Tribe, Haida. Length, 30 cm.

recognize what animal is meant, if the artist did not emphasize what he considers the characteristic features of animals. These are so essential to his mind that he considers no representation adequate in which they are missing. In many cases they become the symbols of the animal. We find, therefore, that each animal is characterized by certain symbols, and great latitude is allowed in the treatment of all features other than symbols.

I will illustrate this feature of the art of the Indians of the North Pacific Coast by means of a number of characteristic examples.

Fig. 6 is a figure from a totem pole, which represents the beaver. It will be noticed that the face is treated somewhat like a human face, particularly the region around eyes and nose. tion of the ears, however, indicates that the artist intended to represent an animal head, not a human head. While the human ear is represented, in its characteristic form, on a level with the eye (Figs. 26 and 28), animal ears are indicated over the forehead; that is to say, approximately in the position in which they appear in a front view of the animal. Their characteristic shape may be seen in Figs. 6 and 7, and in many others. While the ears characterize the head as that of an animal, the two large incisors serve to identify the rodent par excellence,—the beaver. of the animal is turned up in front of its body. It is ornamented by cross-hatching, which is intended to represent the scales on the beaver's tail. In its fore paws it holds a stick. The large incisors, the tail with cross-hatching, and the stick, are symbols of the beaver, and each of these is a sufficient characteristic of the animal.

Fig. 7 is another representation of a beaver from a totem pole. It resembles Fig. 6 in all details, except that the stick is missing. The beaver is simply holding its fore paws raised nearly to its chin. There are other carvings in which the beaver is shown with four or five toes, but the symbols described here never vary.

In Fig. 8, which is the handle of a spoon, we find only the first of the symbols of the beaver represented, namely, its incisors. Only the head and the fore paws of the animal are shown; and in its mouth are indicated an upper and a lower pair of incisors, all the other teeth being omitted. There is nothing except the teeth to indicate that the artist intended to represent the beaver.

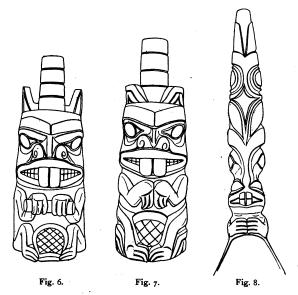


Fig. 6 (188). Lowest figure from model of a totem pole, carved in slate, representing a beaver. Tribe, Haida. Height, 22.5 cm.

Fig. 7 (18). Lowest figure from model of a totem pole, carved in slate, representing a beaver. Tribe, Haida. Height, 19 cm.

Fig. 8 $(\frac{1185}{1185})$. Handle of a spoon made of mountain-goat horn, design representing a beaver. Tribe, Tlingit. Length of handle, 8 cm.

Fig. 9 is the front of a dancing head-dress, which is attached to a framework made of whalebone, and set on top with bristles of the sea-lion. To the back is attached a long train of ermine skins. The outer side of the carved front is set with abalone The squatting figure which occupies the centre of the front represents the beaver. The same symbols which were mentioned before will be recognized here. The face is human; but the ears, which rise over the eyebrows, indicate that an animal is Two large pairs of incisors occupy the centre of the open mouth. The tail is turned up in front of the body, and appears between the two hind legs, indicated by cross-hatching. The fore paws are raised to the height of the mouth, but they do It will be noticed that on the chest of the not hold a stick. beaver another head is represented, over which a number of small rings stretch towards the chin of the beaver. Two feet, which belong to this animal, extend from the corners of its mouth

towards the haunches of the beaver. This animal represents the dragon-fly, which is symbolized by a large head and a slender segmented body. In many representations of the dragon-fly there are two pairs of wings attached to the head. The face of this animal resembles also a human face; but the two ears, which rise over the eyebrows, indicate that an animal is meant. Combinations of two animals of this sort are found very frequently, a smaller figure of one animal being represented on the chest of a larger carving. Examples of this kind will be seen in Figs. 13 and 17.

Fig. 10 is a halibut-hook, the point of which is carved with a design of the sculpin. The symbols of the fish are fins and tail. Those of this species of fish are two spines rising over its mouth, and joined dorsal fins. In this figure the sculpin is represented swallowing a fish, the tail of which protrudes from its mouth. The two spines appear immediately over the lips, their points being between the two eyes, which are represented by two circles with small projections. The two pectoral fins are indicated in basrelief over the eyes. The joined dorsal fins extend from the eyes upward toward the narrowest part of the body. The tail of the animal extends toward the place where point and shank of the hook are bound together by means of a strip of spruce root.

The same animal is represented in a slightly different way in Fig. 11, which represents the lower portion of a totem pole. The lowest figure is probably the sun, or perhaps a starfish. Its arms extend upward, and are being bitten by a sculpin, which latter is shown with its head downward, its back forward, and its tail extending upward. The head will be easily recognized. crescent-shaped ornaments above the corners of the mouth represent the gills of the fish. Above these are seen the pectoral fins. On the level of the pectoral fins toward the middle appear the symbols of the sculpin, namely, the two spines, the lower portions of which are decorated with small human faces. The eye is represented under the spine. The dorsal fin commences at the height of the eyes, and finally merges into the tail. of the fish is clasped by a human figure, which appears cut in two This carving is also characterized by two symby the fish tail. bols.—the two spines and the joined dorsal fins.

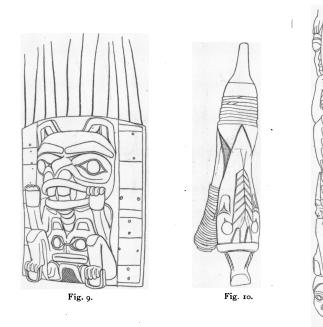


Fig. 9 (14 n). Head-dress representing a beaver. The dragon-fly is shown on the chest of the beaver. Tribe, Haida. Height. 18 cm.

Fig. 10 (15 n). Halibut-hook with design representing a sculpin swallowing a fish. Tribe, Tlingit. Length of point, 26.5 cm.

Fig. 11 (187). Part of a totem pole with design representing a sculpin. Tribe, Tsimshian. Height from base to tip of tail, 220 cm.

Fig. 12 represents a legging made of blue cloth with a red cloth appliqué of the figure of a sculpin. The sides of the legging are trimmed with leather fringes. The general shape of the fish will be easily recognized. Its teeth are represented by buttons of abalone shells, which are sewed on the cloth. eyes and the dorsal fin are indicated in the same manner. Two small triangles cut out to the right and left of the mouth represent the gills. Immediately over the eyes, and extending toward the middle of the back, we find the two spines, indicated by two slender triangular pieces of red cloth cut out in their middle part. The pectoral fins are indicated by two broader pieces of red cloth extending from the eyes outward and upward toward

[May, 1897.]

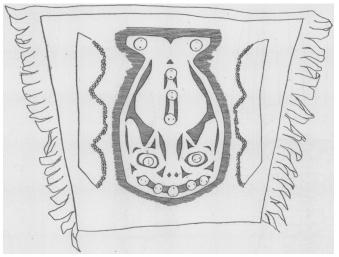


Fig. 12 (128). Woollen legging with an appliqué design representing a sculpin. Tribe, Haida. Length, 28.5 cm.; greatest width, 31 cm., 38 cm. with fringes.

the margin of the body of the fish. The dorsal fin is indicated by the long slits along the back of the animal. In this case the species is best characterized by the two spines which appear over the eyes.

In Figs. 13-16 I give a selection of carvings representing the hawk. The hawk is symbolized by an enormous hooked beak, which is curved backward so that its slender point touches the chin. In many cases the face of the bird is represented as that of a human being. In this case the nose is given the shape of the symbol of the hawk. It is extended in the form of a beak, and drawn back into the mouth, or merged into the face below the lower lip.

Fig. 13 is the front of a head-dress, which is used like the one described before (Fig. 9). The upper, larger face is that of the hawk. The face is human; but the ears, which rise over the eyebrows, indicate that an animal is meant. The body of the animal is exceedingly small, and is hidden behind the smaller, lower face. Its outlines are seen under this face, in the middle of the lower edge of the carving. It is not quite certain whether the two

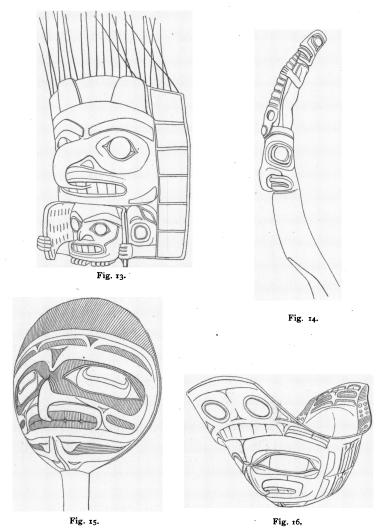


Fig. 13 (182). Head-dress representing a hawk. Tribe, Tsimshian. Height, 20.5 cm.; width, 18.5 cm.

Fig. 14 (10%). Handle of a spoon made of mountain-goat horn: lowest figure representing a hawk; upper figure representing a man holding a dragon-fly. Tribe, probably Tsimshian. Length of carved part of handle, 10 cm.

Fig. 15 (1371). Rattle with design of a hawk. Tribe, Tlingit. Height without handle, 17 cm.

Fig. 16 (198). Dish made of mountain-sheep horn. Tribe, Tlingit. Greatest length, 26 cm.

wings, which are grasped by the arms, are those of the hawk, or whether they belong to the face which is carved on the body of the bird. It will be noticed that over the arm, which is grasping the wing, another wing is carved. Possibly this carving is



Fig. 17 (248). Head-dress representing an eagle bearing a frog on its chest. Tribe, Tsimshian. Height, 19 cm.; width, 15 cm.

intended to represent the wing of the hawk, while the central raised wing is that of the being holding the two central wings.

Fig. 14 is the handle of a spoon, on which is represented the head of a hawk, symbolized by its beak. The top of the spoon represents a man who is holding a small animal with a segmented body, which may represent the dragon-fly, although the head seems rather smaller than we are accustomed to see in representations of the dragon-fly.

In Figs. 15 and 16 the same symbols of the hawk will be recognized.

Fig. 17, the front of a headdress representing the eagle, is very

similar to the preceding series; but it differs from these carvings in that the beak of the bird is not turned back so as to touch the face, but ends in a sharp point extending downward. The wings of the eagle are shown extending from the margin of its body inward. The feet are seen at the sides of the lower margin of the carving, under the wings. On the body of the eagle a rather realistic carving of a frog is shown. The characteristic difference between the eagle and the hawk will also be noticed in the painting on a drum (Fig. 63), in which also the beak ends in a sharp point directed downward, and not turned back toward the face.

Figs. 18 and 19 are representations of the killer-whale. In the rattle (Fig. 18) the form of the whale will be easily recognized. Its tail is bent downward. The large head, one of the characteristic features of the whale, is much more pronounced in this than in the next figure. The eye appears on the front part of the rattle. Under the eye we see the large mouth, which is set with a number of curved spines. They are intended to represent the teeth.

Immediately behind the mouth, on the lower part of the carving, we find the flippers. The painted ornament, which has the form of a small face, in front of the huge dorsal fin, is intended to represent the blow-hole. We find in this specimen a fuller series of the symbols of the whale (namely, a large head, a mouth set with teeth, the blow-hole, and a dorsal fin) than in the next specimen (Fig. 19).

In Fig. 19 the whale is painted on a mask so that the head is placed on the left cheek of the face. The back extends over the

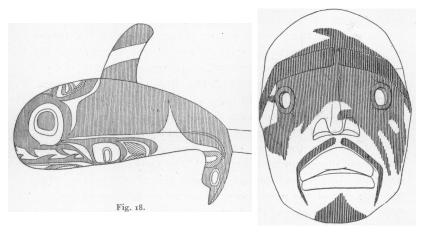


Fig. 18 (306). Rattle representing a killer-whale. Tribe, Haida or Tsimshian. Length, 25 cm.

Fig. 19 (483). Mask with painting representing a killer-whale. Tribe, Bella Coola. Height, 28 cm.; width, 20 cm; depth, 15 cm.

forehead, and the tail is on the right cheek. The whole animal is given the form of a fish whose tail and pectoral fin, or rather flipper, are essential characteristics. The specific characteristic, or the symbol, of the killer-whale, is its large dorsal fin, which rises over the eyebrows. The eye of the animal is indicated by a white spot. Its mouth is open, and is also left uncolored.

The following series (Figs. 20-23) are representations of the shark. Whenever the whole body of this animal is represented, it is characterized by a heterocerc tail, a large mouth, the corners of which are drawn downward, a series of curved lines on each

cheek which represent the gills, and a high tapering forehead, which is often decorated with two circles and a series of curved lines similar to those found on the cheeks.

In Fig. 20 we see the upper part of a totem pole, on which a shark is represented devouring a halibut. The head has the characteristic symbols, to which are added here the numerous sharp teeth which are found often, but not regularly, as symbols of the The greater part of the body has been omitted by the artist, since the animal is sufficiently identified by the symbols found on the head; but under the chin will be noticed the two pectoral fins which identify it as a fish.

Fig. 21 is the handle of a copper dagger on which the mouth with depressed corners, the curved lines on the cheeks, and the ornament rising over the forehead, characterize the shark.

Fig. 22 is a small pipe on which the entire shark is represented. The square end at the right-hand side is the face of the animal, which is shown in front view in the smaller figure. mouth are inlaid with abalone shell. On account of the narrowness of the face, the three curved lines generally found on the cheeks are placed under the mouth. The forehead has the characteristic height and tapering shape described before. opposite end of the pipe shows the heterocerc tail turned upward. On the sides are carved the pectoral fins, which extend over about one-half of the whole length of the sides of the pipe.

Fig. 23 is a copy of a tattooing on the back of a Haida woman. Here we have only the outline of the head of a shark, again characterized by a peculiarly high forehead, the depressed corners of the mouth, and curved lines on each cheek.

Fig. 24 represents a fabulous sea-monster with the head and fore legs of a bear and the body of a killer-whale, but with two or three dorsal fins. Flippers are attached to the fore legs. The head of the specimen shows one of the most characteristic symbols of the bear, namely, the wide mouth set with teeth, the tongue The large paws are a second symbol of the bear. The sea-monster is also symbolized by the three crescents which are shown behind the corner of the mouth. These are intended to represent gills. We shall find a series of representations of this fabulous monster later on (Figs. 73, 75, 76, and 77).

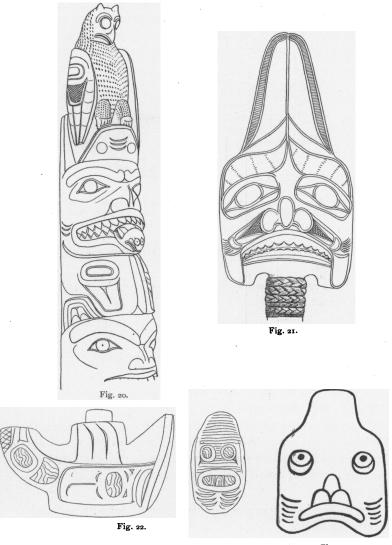


Fig. 23 (1187). Part of model of a totem pole carved in slate with design representing a shark surmounted by an eagle. Tribe, Haida. Length of shark figure, 13.5 cm.; width, 6.5 cm.

Fig. 21 (25). Handle of a dagger representing the head of a shark. Tribe, Tlingit. Length of handle, 15 cm.; width, 7.5 cm.

Fig. 22 (48). Wooden pipe, representing a shark. Tribe, Tlingit. Length, 10 cm.; height, 6 cm.; depth, 3 cm.

Fig. 23. Tattooing representing a shark. Tribe, Haida. (From a photograph.)

Let us briefly recapitulate what we have thus far tried to show. Animals are characterized by their symbols, and the following series of symbols has been described in the preceding remarks:

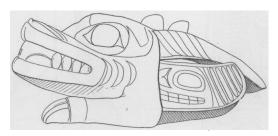


Fig. 24 (177). Wood carving representing a fabulous monster with a bear's head and paws, and the body of a killer-whale. Tribe, Tlingit. Length, 33.5 cm.; width, 23.5 cm.; height, 13 cm.

- 1. Of the beaver: large incisors, scaly tail, and a stick held in the fore paws.
- 2. Of the sculpin: two spines rising over the mouth, and a continuous dorsal fin.
- 3. Of the hawk: large curved beak, the point of which is turned backward so that it touches the face.
- 4. Of the eagle: large curved beak, the point of which is turned downward.
- 5. Of the killer-whale: large head, large mouth set with teeth, blow-hole, and large dorsal fin.
- 6. Of the *shark*: an elongated rounded cone rising over the forehead, mouth with depressed corners, a series of curved lines on the cheeks, two circles and curved lines on the ornament rising over the forehead, round eyes, numerous sharp teeth, and heterocerc tail.
- 7. Of the bear: large paws, and large mouth set with teeth, with protruding tongue.
- 8. Of the sea-monster: bear's head, bear's paws with flippers attached, and gills and body of the killer-whale, with several dorsal fins.
- 9. Of the *dragon-fly*: large head, segmented, slender body, and wings.

So far I have considered the symbols only in connection with their use in representing various animals. It now becomes necessary to inquire in what manner they are used to identify the animals. We have seen that in a number of the preceding cases entire animals were represented, and that they were identified by means of these symbols. When we investigate this subject more closely, we find that the artist is allowed wide latitude in the

selection of the form of the animal. Whatever the form may be, as long as the recognized symbols are present, the identity of the animal is established. We have mentioned before that the symbols are often applied to human faces, while the body of the figure has the characteristics of the animal.

We find this principle applied in Fig. 25, which represents a totem pole. Three animals are shown in this carving. Each of these has a human face, to which are added the symbols that characterize the animal. In the top figure the ears indicate that the head represents that of an animal; while the arms, to which the flippers are attached, indicate that the sea-monster (see Fig. 24) is meant. The next figure below represents the shark. It has a human face, and it seems that originally a large lip with a labret was attached to it, which, however, was lost before the specimen came into possession of the This would indicate that a female Museum. shark is represented. Its symbols in this case are the peculiar high ornament which rises over its forehead, and the fins, which are placed under the chin. The face of the lowest figure resembles the faces of the two upper figures very closely. Its body, which is shown under the face, makes it clear that the artist intended to represent a fish; and the two large spines which rise over the eyebrows specify that the figure represents a sculpin.

While in these cases the entire animals have been represented, in others only parts of animals



Fig. 25 (1%). Model of a totem pole with three figures representing, from below upward, a sculpin, dog-fish, and sea-monster. Tribe, Haida, Height, 47.5 cm.

are shown in conventional forms which combine elements of the human form with those of the animal. In other cases the symbols are applied to a purely human face.

Fig. 26 is a human face with human ears. Only the nose indicates that the mask is not intended to represent a human being.







Fig. 27.

Fig. 26 (1881). Mask representing a hawk. Tribe, Tlingit. Height, 21.5 cm.; width, 17.5 cm.; depth, 10 cm.

Fig. 27 $(\frac{E}{337})$. Mask with painting symbolizing the red-winged flicker. Tribe, Tlingit. Height (excluding ears), 25 cm.; width, 20 cm.; depth, 11 cm.

It is strongly curved, and drawn back into the mouth, thus symbolizing that the mask is intended to represent the hawk.

In Fig. 27 we see the face of a woman with a moderately large labret. The ears, as explained before, are those of an animal. The nose, which has been lost, had undoubtedly the form of a bird's beak. Thus the face was characterized as that of a bird. It was specified partly by the form of the beak, but principally by the ornaments painted in red and black on cheeks and fore-head. These represent the feathers of the red-winged flicker.

Fig. 28 is a small carved mask which was worn in front of a headband of swan's down. It represents a human face. In place of the eyebrows we find two rows of circles, which represent the sucking-cups of the squid. By means of this symbol the face is recognized as that of the squid.







Fig. 29.

Fig. 28 ($\frac{1}{3}\frac{1}{3}\frac{1}{3}$). Small mask with eyebrows, symbolizing the squid. Tribe, Tlingit. Height (excluding hair), 11 cm; width, 9.5 cm.; depth, 5.5 cm.

Fig. 29 ($\frac{E}{1839}$). Mask with painting symbolizing the killer-whale. Tribe, Tlingit. Height, 18 cm.; width, 15 cm.; depth, 8 cm.

In the same manner the mask (Fig. 29) is identified as the killer-whale by the two black ornaments painted on the left cheek and extending down to the chin. They represent the dorsal fin of the killer-whale.

These symbols are also used as facial paintings by dancers, who are thus recognized as personifying the animal in question, or as belonging to the social group presided over by the animal. At social or religious festivals ceremonies are performed which are in most cases dramatizations of myths, in which the dancer represents either the animal, or the spirit that appeared to his ancestor. In many of the composite masks used on such occasions,

the ancestor himself is represented by a small figure placed on the mask, thus indicating that he was carried away by the animal which the dancer personifies. In other festivals, legends are dramatized which refer to the events that took place "before the animals took off their blankets;" that is, at the time when there was no clear distinction between men and animals. In these ceremonies the dancers appear with paintings or other decoration symbolizing the animals. To this class belongs the ornament (Fig. 30), which represents the dorsal fin of a killer-whale, and which is worn attached to the back part of the blanket. These ornaments and paintings are found most extensively among the Kwakiutl tribes.

It appears, therefore, that as, first of all, the artist tried to characterize the animals he intended to represent by emphasizing their most prominent characteristics, these gradually became symbols which were recognized even when not attached to the animal form, and which took the place of representations of the entire animal.

Having thus become acquainted with a few of the symbols of animals, we will next investigate in what manner the native artist adapted the animal form to the object he intended to decorate. First of all, we will direct our attention to a series of specimens which show that the native artist endeavors, whenever possible, to represent the whole animal on the object that he desires to decorate.

Fig. 31 is a club used for killing seals and halibut before they are landed in the canoe. The carving represents the killer-whale. If the principal symbol of the killer-whale, its dorsal fin, were placed in an upright position on the club, the implement would assume an exceedingly awkward shape. On the other hand, the artist could not omit the dorsal fin, since it is the most important symbol of the animal. Therefore he has bent it downward along the side of the body, so that it covers the flipper. The tail of the whale would have interfered with the handle, and for this reason it has been turned forward over the back of the whale, so as to be in close contact with the body.

The distortion of the body has been carried still further in Fig. 32, which is the handle of a spoon, and represents the same

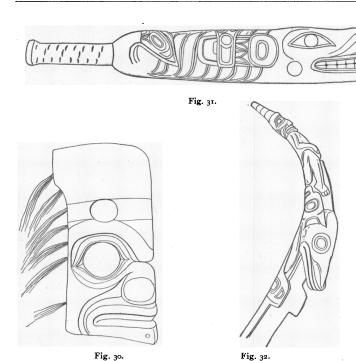


Fig. 30 $(\frac{E}{923})$. Wood carving representing the dorsal fin of the killer-whale. Tribe, Tlingit. Height, 25 cm.; thickness, 3 cm.

Fig. 31 $(\frac{E}{323})$. Fish-club carved to represent the killer-whale. Tribe, Tlingit. Total length, 49 cm.; height, 8 cm.; thickness, 5 cm.

Fig. 32 $(\frac{16}{113})$. Handle of horn spoon with design representing a killer-whale. Tribe, probably Tsimshian. Length of handle, 15 cm.

animal. The large head of the whale, to which the flippers are attached, will be easily recognized near the bowl of the spoon. The body has been twisted backward so that the tail almost touches the mouth. The carving is only on the back of the spoon, and the two projections just below the mouth will be recognized as the two tips of the whale's tail, which has been split along its lower side and then distended along the back of The dorsal fin has thus been brought into a position so as to extend along the handle of the spoon. It is seen projecting upward from the head of the whale, between the legs of the man who forms the tip of the handle.



Fig. 33 (1187). Model of a totem pole representing a shark. Tribe, Haida. Height, 27 cm.; width, 5 cm; depth,

Fig. 33 is a small totem pole representing the The tip of its tail forms the top of the pole, while the face is placed at its lower end. Since most of the symbols of the shark are found on its face, it was necessary to bring the face into such a position as to be seen in front view, but the artist also desired to show the back of the For this reason the head has been twisted around entirely, so that it appears in front view over the back of the fish. In order that the flippers, an important symbol of the fish, might be made visible, they have been pushed backward far beyond the place to which they properly belong.

The speaker's staff (Fig. 34), which also represents the shark, has been distorted in the same manner; but here the head has been turned round entirely, so that it faces the back of the fish. The pectoral fins are shown below the chin.

In Fig. 35, which is a berry-spoon representing a shark, the lower jaw of the animal has been entirely omitted. The flat bowl of the spoon is formed by the palate of the fish, while

its back is the lower side of the spoon.

The changes of position and of the relative sizes of parts of the body, which result from such adaptations to the form of the object to be decorated, are still more far-reaching in the following specimens.

Fig. 36 is a shark represented on the top of a totem pole. The head of the animal is shown in the form of a human face with the characteristic symbols. Under the chin are two flippers. The body must be considered turned upward; but it has been shortened so much that only the tail remains, which rises immediately above the face.

In Fig. 37 (a wooden dancing hat) the symbols of the killerwhale are attached to its head. Since the whole body was omitted in this case, it was necessary to remove the symbols from the back to the head. We see the dorsal fin rising over the eyes, and the flippers attached to the head behind the eyebrows.

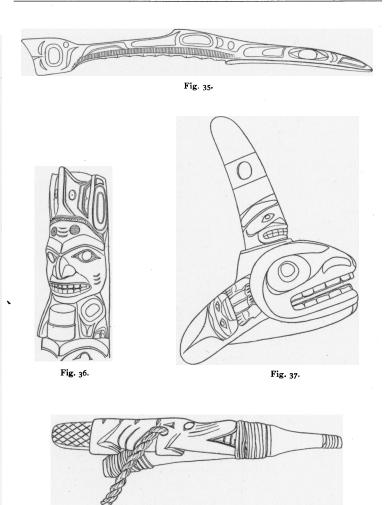


Fig. 38.

Fig. 34 (180). Speaker's staff representing a shark. Tribe, Tlingit. Length, 184 cm.

Fig. 35 (2852). Berry-spoon representing a shark. Tribe, Tsimshian. Length, 36 cm.; width, 4.5 cm.

Fig. 36 (184). Part of a totem pole representing a shark. Tribe, Haida. Height of shark carving, 20 cm.; width, 8.5 cm; depth, 7.5 cm.

Fig. 37 (χ_{10}^{48}). Dancing hat representing a killer-whale. Tribe, Tsimshian. Total height, 50 cm.; width, 28 cm.; depth, 30.5 cm.

Fig. 38 ($_1$ 182). Halibut-hook with design representing a beaver. Tribe, Tlingit. Length of point, 32.5 cm.

In Fig. 38, which represents a halibut-hook carved with a design of the beaver, we find that the two incisors, the symbols of the beaver, have been moved over to the right side of the animal which is represented on the point of the hook. While in reality only one of the incisors would be visible in this view, the artist, in order to be certain that his idea would be understood, moved the two incisors so as to make both visible. We find that in all these cases the artist has taken great liberty with the form of the animal body, and has treated it so that the symbols become clearly visible. On the whole, we may say that the artist endeavors to represent the whole animal. When this is not possible, all its essential parts are shown. The insignificant ones are often omitted.

We have now to treat a series of peculiar phenomena which result from the endeavor on the part of the artist to adjust the animal that he desires to represent to the decorative field in such a manner as to preserve as far as possible the whole animal, and bring out its symbols most clearly.

Fig. 39 is the top view of a wooden hat on which is carved the figure of a sculpin. The animal is shown in top view, as though it were lying with its lower side on the hat. The dancing hats of these Indians have the forms of truncated cones. To the top are attached a series of rings, mostly made of basketry, which indicate the social rank of the owner, each ring symbolizing a step in the social ladder. The top of the hat, therefore, does not belong to the decorative field, which is confined to the surface of the cone. The artist found it necessary, therefore, to open the back of the sculpin far enough to make room for the gap in the decorative field. He has done so by representing the animal as seen from the top, but split and distended in the middle, so that the top of the hat is located in the opening thus secured.

Fig. 40 represents a dish in the shape of a seal. The whole dish is carved in the form of the animal; but the bottom, which corresponds to the belly, is flattened, and the back is hollowed out so as to form the bowl of the dish. In order to gain a wider rim the whole back has been distended so that the animal becomes inordinately wide as compared to its length. The flippers are carved in their proper positions at the sides of the dish. The

hind flippers are turned back, and closely join the tail. A similar method of representation is used in decorating small boxes. The whole box is considered as representing an animal. The front of its body is painted or carved on the box front; its sides, on the sides of the box; the hind side of its body, on the back of the box. The bottom of the box is the animal's stomach; the top, or the open upper side, its back. These boxes, therefore, are decorated only on the sides, which are bent of a single piece of



Fig. 39.

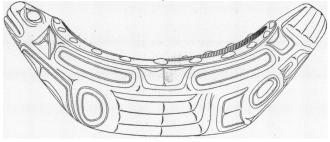


Fig. 40.

Fig. 39 (18). Dancing hat with design representing a sculpin. Tribe, Haida or Tsimshian. Height, 14 cm.; width, 36 cm.; depth, 40 cm.

Fig. 40 ($\frac{E}{1388}$). Grease dish in the shape of a seal. Tribe, Tlingit. Length, 41.5 cm.; width, 21 cm.; depth in centre, 9.5 cm.

[May, 1897.]

wood (Fig. 41). When we unbend the sides we find the decoration extended on a long band, which we may consider as consisting of two symmetrical halves. The centre is occupied by the front view of the animal, the sides by a side view, and the ends by one-half of the hind view at each end of the board. An actual unbending of the sides of the box would not give a symmetrical form; but, since the ends are necessarily sewed at the corner, the hind view of the body will occupy one end.

In the decoration of silver bracelets a similar principle is followed, but the problem differs somewhat from that offered in the decoration of square boxes. While in the latter case the four edges make a natural division between the four views of the animal,—front and right profile, back and left profile,—there is no such sharp line of division in the round bracelet, and there would be great difficulty in joining the four aspects artistically, while two profiles offer no such difficulty. When the tail end of each profile is placed where the ends of the bracelet join, then there is only one point of junction; namely, in the median line of the This is the method of representation that the native artists have adopted (Figs. 42, 72, 73, 74). The animal is cut in two from head to tail, so that the two halves cohere only at the tip of the nose and at the tip of the tail. The hand is put through this hole, and the animal now surrounds the wrist. In this position it is represented on the bracelet. The method adopted is therefore identical with the one applied in the hat (Fig. 39), except that the central opening is much larger, and that the animal has been represented on a cylindrical surface; not on a conical one.

An examination of the head of the bear shown on the bracelet (Fig. 42), makes it clear that this idea has been carried out rigidly. It will be noticed that there is a deep depression between the eyes, extending down to the nose. This shows that the head itself must not be considered a front view, but as consisting of two profiles which adjoin at mouth and nose, while they are not in contact with each other on a level with the eyes and forehead. The peculiar ornament rising over the nose of the bear, decorated with three rings, represents a hat with three rings (see p. 144), which designate the rank of the bearer.

We have thus recognized that the representations of animals on dishes and bracelets (and we may include the design on the hat, Fig. 39) must not be considered as perspective views of animals, but as representing complete animals more or less distorted and split.

The transition from the bracelet to the painting or carving of animals on a flat surface is not a difficult one. The same principle

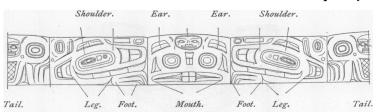


Fig. 41.



Fig. 42.

Fig. 41 (383). Carving on the sides of a dish representing a beaver. The sides of the dish are bent of a single piece of wood, and are shown here flattened out. Tribe, Tlingit. Length of short sides, 29 cm.; length of long sides, 31.5 cm; greatest height of sides, 16 cm.

Fig. 42 (RE). Design on a bracelet representing a bear. Tribe, Nass River Indians. Height, 3.5 cm.

is adhered to; and either the animals are represented as split in two so that the profiles are joined in the middle, or a front view of the head is shown with two adjoining profiles of the body. In the cases considered heretofore the animal was cut through and through from the mouth to the tip of the tail. These points were allowed to cohere, and the animal was stretched over a ring, a cone, or the sides of a prism. If we imagine the bracelet opened, and flattened in the manner in which it is shown in Fig. 42, we have a section of the animal from mouth to tail, cohering only at the mouth, and the two halves spread over a flat surface. This is the natural development of the method here described when applied to the decoration of flat surfaces.

It is clear that on flat surfaces this method allows of modifications by changing the method of cutting. When the body of a long animal, such as that of a fish or of a standing quadruped, is cut in this manner, a design results which forms a long narrow strip. This mode of cutting is therefore mostly applied in the decoration of long bands. When the field that is to be decorated is more nearly square, this form is not favorable. In such cases



Fig. 43. Painting representing a bear. Tribe, Haida.

a square design is obtained by cutting quadrupeds sitting on their haunches in the same manner as before, and unfolding the animal so that the two halves remain in contact at the nose and mouth, while the median line at the back is to the extreme right and to the extreme left.

Fig. 43 (a Haida painting) shows a design which has been obtained in this manner. It represents a bear. The enormous breadth of mouth observed in these cases is brought about by the junction of the two profiles of which the head consists.

This cutting of the head is brought out most clearly in the painting (Fig. 44), which also represents the bear. It is the painting on the front of a Tsimshian house, the circular hole in the middle of the design being the door of the house. The animal is cut from back to front, so that only the front part of the head coheres. The two halves of the lower jaw do not touch each





Fig. 44.

Fig. 45.





Fig. 46.

Fig. 44. Painting from a house front representing a bear. Tribe, Tsimshian.

Fig. 45 $(\frac{1}{2}\frac{1}{2})$. Wooden hat painted with the design of a sculpin. Tribe, Haida. Height, 17 cm.; width, 41 cm.; depth, 42.5 cm.

Fig. 46 (1853). Hat made of spruce roots painted with the design of a beaver. Tribe, Haida or Tsimshian. Height, 16 cm.; diameter, 36.5 cm.

other. The back is represented by the black outline on which the hair is indicated by fine lines.

In a number of cases the designs painted on hats must also be explained as formed by the junction of two profiles. This is the case in the painted wooden hat (Fig. 45), on which the design of a sculpin is shown. It will be noticed that only the mouth of the animal coheres, while the eyes are widely separated. spines rise immediately over the mouth. The flippers are attached to the corners of the face, while the dorsal fin is split into halves, each half being joined to an eye.

The beaver (Fig. 46) has been treated in the same manner. The head is split down to the mouth, over which rises the hat with four rings. The split has been carried back to the tail, which, however, is left intact, and turned up towards the centre The importance of the symbols becomes very clear of the hat. in this specimen. If the two large black teeth which are seen under the four rings, and the tail with the cross-hatchings, were omitted, the figure would represent the frog.

In other designs the cut is made in the opposite direction from the one described heretofore. It passes from the chest to the back, and the animal is unfolded so that the two halves cohere along the middle line of the back. This has been done in the Haida tattooings (Figs. 47 and 48), the former representing the raven, the latter the duck. In both the tail is left intact. The duck has been split along the back so that the two halves of the body do not cohere except in their lowest portion, while the two halves of the raven are left in contact up to the head.

Fig. 49 is a dancing apron woven from mountain-goat wool, and fastened to a large piece of leather, the fringes of which are set with puffin beaks. The woven design represents the beaver. Its symbols, the two pairs of incisors and the scaly tail, are clearly represented. While in most carvings and paintings the tail is turned upward in front of the body, it is hanging down here between the two feet. The meaning of the ornaments in the upper part of the apron to the right and to the left of the head are not quite clear to me, but I believe they must be considered as the back of the body split and folded along the upper margin of the blanket. If this explanation is correct, we have to con-

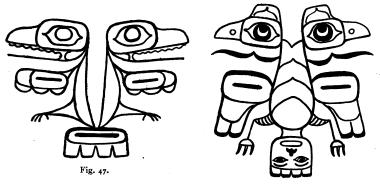


Fig. 48.

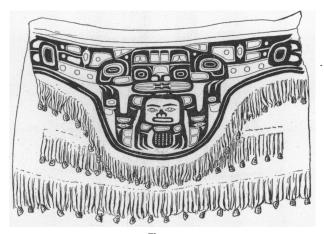


Fig. 49

Fig. 47. Tattooing representing a duck. Tribe, Haida.

Fig. 48. Tattooing representing a raven. Tribe, Haida.

Fig. 49 $(\frac{16}{148})$. Dancing apron woven of mountain-goat wool, design representing a beaver. Tribe, Tsimshian. Height of design, 38 cm.; width, 91 cm.

sider the animal cut into three pieces, one cut running along the sides of the body, the other one along the back.

Fig. 50 is one of a pair of leggings embroidered with quills on a piece of leather. The design, which represents the sea-monster described in Fig. 24, must also be explained as a representation of the animal split along its lower side, and flattened. In the lower

portion of the legging the two profiles are seen, which are joined on a level with the eyes, while the two mouths are separated. The nostrils are shown in the small triangle below the line connecting the two eyes. Owing to the shape of the legging, the arms are not attached to the body, but to the upper part of the head. They appear at the right and left margins of the legging,



Fig. 50 (184). Embroidered legging representing a sea-monster with a bear's head and body of the killer-whale. Tribe, Haida. Height, 37.5 cm.; greatest width, 31 cm.

and are turned inward along the lower jaws, the three-toed paws touching the lower margin. The fins, which are supposed to grow out of the upper part of the arms, adjoin the elbows, and are turned upward. Another pair of fins, which do not appear in most representations of this monster, are attached to the upper part of the back, and form the two flaps to the right and left of the upper margin. On the back we see a series of circles, which probably represent the dorsal fins. The tail occupies the centre of the upper margin. The smaller ornaments in the outside corners of the head, adjoining the mouth, probably represent the gills.

Fig. 51 represents a leather legging painted with the design of a beaver squatting on a human head. In this specimen we observe that the proportions of the body have been much distorted owing to the greater width of the legging at its upper part. The head has been much enlarged in order to fill the wider portion of the decorative field.

The gambling leather (Fig. 52) is treated in a similar manner. It represents the beaver, and must probably be explained as the





Fig. 51.

Fig. 51 (185). Painted legging with design representing a beaver sitting on a man's head. Tribe, Haida. Height, 22 cm.; greatest width, 19 cm.

Fig. 52 $(\frac{100}{100})$. Gambling leather with engraved design representing a beaver. Tribe, Tlingit. Height, 18.5 cm.; width, 17 cm.

animal cut in two. The symbols—the large incisors and a scaly tail—appear here as in all other representations of the beaver, but the lower extremities have been omitted. It might seem that this design could be explained as well as a front view of the animal, but the deep depression between the two eyes is not in favor of this assumption. The head consists undoubtedly of two profiles, which join at the nose and mouth; but the cut has not been continued to the tail, which remains intact.

In the following figures we find a new cut applied. Figs. 53 and 54 represent the shark. I explained, when discussing the symbols of the shark, that in the front view of the animal the

symbols are shown to best advantage. For this reason side views of the face of the shark are avoided, and in representing the whole animal a cut is made from the back to the lower side, and the two sides are unfolded, leaving the head in front view.

The painting (Fig. 53) has been made in this manner, the two halves of the body being entirely separated from each other, and

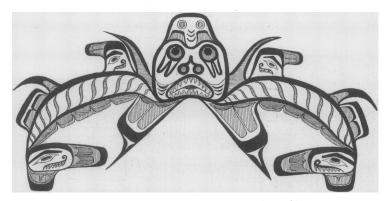


Fig. 53. Painting representing a shark. Tribe, Haida.

folded to the right and to the left. The heterocerc tail is cut in halves, and is shown at each end turned downward. pectoral fins are shown unduly enlarged, in order to fill the vacant space under the head.

The shark which is shown in Fig. 54 is treated in a slightly different manner. Again the head is left intact. The cut is made from back to chest, but the two halves of the animal are not separated. They cohere at the chest, and are unfolded in this manner, so that the pectoral fins and dorsal fins appear to the right and left of the body. The heterocerc tail is not clearly indicated in this specimen.

The method of section applied in Fig. 55 is still different. figure represents a painting on the margin of a large leather blanket. The animal here represented is the killer-whale. The upper painting clearly represents the profile of the animal. lower painting represents the other profile, so that both the right and the left halves of the animal are shown. Since there was no room for showing the dorsal fin on the lower painting, it is indicated by a curved line on one of the series of wider fringes at the lower margin of the blanket. It is remarkable that the tails in the two halves of the animal are not drawn symmetrically; but it is possible that this is due to a mistake on the part of the painter, because the design is repeated on the opposite margin of the blanket in the same manner, but with symmetrical tails. halves of the body differ in details, but their main features are

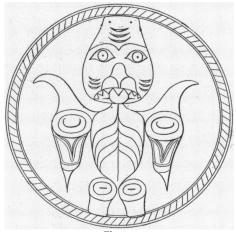


Fig. 54.

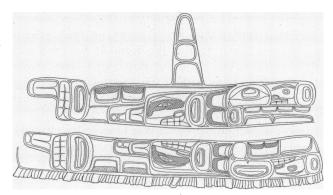


Fig. 55.

Fig. 54 (1983). Slate dish with carved design representing a shark. Tribe, Haida. Diameter, 27.5 cm.; depth, 3.5 cm.
Fig. 55 (1852). Painting on edge of a blanket representing a killer-whale. Tribe, Tlingit. Length, 124 cm.

identical. The flipper is shown on a very large scale. attached immediately behind the head, and extends to a point near the tail. Its principal part is occupied by a face, in front of which an eye is shown.

Animals are represented by means of sections not only on flat surfaces, but also in round carvings in which one side cannot be This is the case on all totem poles, the hind part of Whenever all the symbols of the animal can which is not carved. be shown on the front of the totem pole, the animals are apparently represented in their natural position. But representations of animals, the symbols of which would be placed on the rear side of the totem pole, make it clear that the artist actually splits the animals along the rear of the totem pole, and extends this cut in such a way that the animal is spread along the curved front of the pole. This will become clear by a consideration of the following figures.

Fig. 56 represents a sea-monster with a whale's body and bear's paws. It differs from the monster discussed before in that it has a whale's head, and no fins attached to the fore paws. It has, The blow-hole of the whale is however, one large dorsal fin. shown over its eyebrows. The tail is turned up in front of the body, and the paws are raised in front of the chest. The dorsal fin will be recognized in the narrow strip, ornamented with a small ring, which slants downward from the elbow towards the An ornament of this sort is shown on both sides of the We see, therefore, that the dorsal fin has been split, and is turned down along each side of the body. This shows that the right and left margins of the carved portion of the totem pole must be considered as the medial line of the back, which has been split and pulled apart.

The sculpin shown on the totem pole (Fig. 57) is treated in the same manner, but in this case the cut is made along the lower side of the animal. The head is turned upward, so that the front view of the face is seen when looking down upon the back of the The spines rise over nose and eyebrows. The pectoral fins are shown over the eyebrows on the edge of the carved portion of the pole, while the hind portion of the lower part of the body occupies the upper part of the margin of the pole.



Fig. 56 (144). Part of model of a totem pole with design representing a sea-monster. Tribe, Haida. Height of figure, 23 cm.; width, 7.5 cm.; depth, 6 cm.

Fig. 57 (1787). Part of model of a totem pole with design representing a sculpin. Tribe, Haida. Height of figure, 15 cm.; width, 5.5 cm.; depth, 5.5 cm.

Fig. 58. Part of a totem pole with design representing a sea-monster devouring a fish. Tribe, Haida. Height of figure (excluding ears), 13 cm.; width, 5.5 cm.; depth, 5 cm. α , dorsal fin; δ , fin of forearm; c, tail of monster; d, paws of monster; e, wing of bird.

The exceedingly intricate central figure on the pole shown in Fig. 58 must be explained in the same manner as Fig. 56. We see here the sea-monster described before in Fig. 24. It has a bear's head. In each ear is placed a small human figure the hands of which grasp the eyelid of the monster, which they are lifting. The tail is turned upward in front of the body, immediately over a beaver's head, which is the next lower figure on the

The dorsal fin has been split, and one-half of it is seen under the mouth of the bear, indicated by a projection which is decorated with a double circle. The fore paws of the animal are raised in front of its chest, and appear under the mouth. fins which are attached to them are shown to the right and to the left of the tail. The animal is swallowing another being, but it is not clear what animal is meant. A fish-tail and a hand are seen protruding from the mouth. The space between the fore paws and the tail of the sea-monster is occupied by an inverted bird, which will be seen clearly when the figure is reversed. Its head is shown with beak resting between the feet. The two wings are extended, and reach from the fins of the fore arm of the monster to its dorsal fin. The particular point brought out by this figure is the same as that which I tried to make clear in considering Fig. 56; namely, that the two edges of the carved pole must be considered as the extended medial line of the back of the animal that is represented on the pole.

These carvings make it clear that in paintings on hats, such as shown in Figs. 39, 45, and 46, and in flat figures, such as Fig. 12, we must consider the outer rim of the figure as the distended sides of a cut made along the lower side of the animal. All these distortions and sections of animals may be explained by the necessity the artist felt of showing all the symbols of the animal in his works.

In most cases the symbols appear clearly in profiles of animals. For this reason the artist, when representing profiles, has not endeavored to show both sides of the body. I will give here a series of figures illustrating this point.

Fig. 50 represents the top of a box on which is carved the seamonster Wasku. It has a wolf's head and body, and a large dorsal fin. It is able to hunt in the sea as well as on land. artist has shown a profile of the animal with one fore leg and one hind leg, the tail curled up over the back. The dorsal fin, which in most representations of this animal stands out vertically from the body, has been laid down along the back in order to fit it into the decorative field.

Fig. 60 is a tattooing representing the sea-monster Tsem'aks, which has a raven's body with a whale's body attached to its head, and a fin attached to the raven's back. It is shown in profile with one leg, the dorsal fin, and the tails of raven and whale twisted around so as to be seen from the side.

Fig. 61 is a tattooing representing the moon. In its lower portion the crescent will be seen. In the dark portion of the moon





Fig. 61.

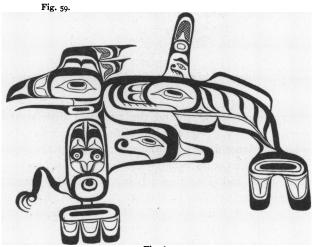


Fig. 60.

Fig. 59 ($^{16}_{187}$). Slate carving representing the sea-monster Wasku. Tribe, Haida. Size, 29.5 x 19.5 cm.

Fig. 60. Tattooing representing the fabulous sea-monster Tsem'aks. Tribe, Haida. Fig. 61. Tattooing representing the moon. Tribe, Haida.

a semi-human figure is shown in profile, with one leg. One arm is extended downward, and one backward, as though he were lifting a heavy weight.

In Fig. 62, which represents the design on a circular slate dish, we see a good case of the adaptation of a profile to the decorative field. The design represents a killer-whale with two dorsal



Fig. 62 ($\frac{16}{100}$). Slate dish with design representing a killer-whale. Tribe, Haida. Diameter, 41.5 cm.; depth, 6.5 cm.

fins. The animal is bent around the rim of a dish so that the head touches the tail. The two dorsal fins are laid flat along the back, while the large flipper occupies the centre of the dish.

Fig. 63, which is the painting on the head of a drum, is a combination of front and side views. It is a system of representation with which we are familiar in the art of ancient Egypt. Here the head is turned sideways, while the body, the outstretched wings, and the feet are shown in front view. It is found very rarely in the art of the Indians of the North Pacific coast, and, so far as I am aware, almost exclusively in representations of the eagle. The painting on the outer ring of the drum-head is difficult to explain. It will be noticed that the tail of the eagle

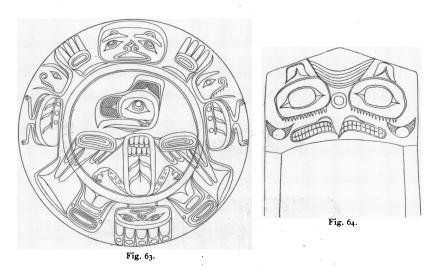


Fig. 63 (148). Drum painted with design of an eagle. Tribe, Tsimshian. Diameter, 58 cm.
Fig. 64 (1238). Carving on the end of a food tray representing a hawk. Tribe, Tlingit. Width, 20 cm.

occupies the lower centre of the ring. On top we see the front view of a human figure, the arms of which are placed near the lower corners of the face, and are of diminutive size, while the hands are of very large size. The two sitting figures below the two hands probably represent the back of the man who is shown on top, but their connection with the peculiar fin-like figures on the lower portion of the painting is not clear.

There are very few designs which can possibly be interpreted as full-face views of animals. I explained before that the face of the shark is always shown in this manner, because its symbols appear best in this position. The only other animal which is painted or carved on flat surfaces in full front view is the hawk or thunder-bird, whose symbol is the long beak which descends to the chin. A number of carvings representing the thunder-bird were given in Figs. 13-16.

We find full-face representations of the thunder-bird very frequently used on-dishes, on which the beak is indicated by a long wedge which separates the mouth into two halves. It is, however, [May, 1807.]

not certain whether the artists consider this face always as a full front view, because we often find (Fig. 64) a depression between the two eyes, corresponding to the depression which I described before when referring to the joining of the profiles of animals. It may be that the long central wedge must be considered as the two halves of the long descending beak, which join in the middle.

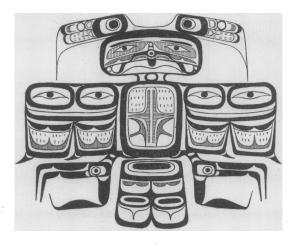


Fig. 65. Painting from front of a house representing a thunder-bird. Tribe, Kwakiutl.

It might be expected, however, that in this case the beak would, at least sometimes, be carried on outward to the right and to the left below the chin, corresponding to one-half of the beak seen in Fig. 13. I have not observed a single specimen in which this is the case, and therefore I am rather inclined to consider the carvings of thunder-birds on dishes as full front views.

This ornament may have originated in the following manner: Many grease and food dishes have the form of canoes. canoe symbolizes that a canoe-load of food is presented to the guests; and that this view is probably correct is indicated by the fact that the host in his speeches often refers to the canoe filled with food which he gives to his guests. The canoe form is often modified, and a whole series of types can be established forming the transition between canoe dishes and ordinary trays. Dishes of this sort always bear a conventionalized face at each short end, while the middle part is not decorated. This is analogous to the style of the decoration of the canoe. On the whole the decoration of the canoe is totemistic. It may be that it is only the peculiar manner in which the beak of the hawk is represented which has given rise to the prevalence of this decoration. upper jaw of the hawk is always shown so that its point reaches the lower jaw and turns back into the mouth. When painted or carved in front view the beak is indicated by a narrow wedgeshaped strip in the middle of the face, the point of which touches the lower margin of the chin. The sharp bow and stern of a canoe with a profile of a face on each side, when represented on a level or slightly rounded surface, would assume the same shape. Therefore it may be that originally the middle line was not the beak of the hawk, but the foreshortened bow or stern of the canoe. This decoration is so uniform that the explanation given here seems to me very probable.

In Fig. 65 we see a painting representing a full front view of the thunder-bird. Its principal symbol is the long beak, which in front view appears like a long line descending from the nose over the mouth. It is doubtful if in this case the body may be considered as being split along the back. On account of the fact that the face is certainly represented as a full-face view, it seems to me more likely that the animal is represented with spread wings, similar to the eagle in Fig. 63.

I have described a number of sections applied in representing various animals. Heretofore we have had cases only in which the sections were rather simple. In many cases in which the adaptation of the animal form to the decorative field is more difficult, the sections and distortions are much more numerous and far-reaching than those described before.

The cut that has been applied in the totem pole (Fig. 66) is also much more intricate than the preceding ones. The upper figure represents a bird which is shown in the form of a human being, to the arms of which wings are attached. Under this figure we find a representation of the killer-whale. The hind part of its body is more easily recognized than the head. A small human figure is seen riding on the dorsal fin. The tail, which

appears at the lower margin of the figure, is turned backward over the back of the animal. We must therefore imagine that the head has been turned downward behind the human figure riding on the dorsal fin. We must remember that the part of the animal which is turned downward will be placed in the back of the totem pole, which is not carved, and that consequently, according to what was stated before, the artist will split it and distend it so that the middle line will appear at each edge of the carved portion Thus the right half of the head will be brought into view on the right side of the totem pole, the left half on the left. This is the explanation of the whale's head with its teeth, which is seen in our figure next to the tail, the lower jaw being omitted. The flipper, which adjoins the head, is laid over the back of the whale, immediately under the feet of the human being riding on the dorsal fin of the whale. The figure must therefore be explained in such a way that the animal is twisted twice, the tail being turned up over the back, and the head being turned down under the stomach, the head being then split and extended outward.

Fig. 67 is a copy of a painting on the front of a box. It represents a frog. By far the greater portion of the box-front is occupied by the head of the animal, which, according to what was said before, must be considered as consisting of two adjoining profiles. The symbol of the frog's head is its toothless The two black portions extending downward from the lower corners of the face are two halves of the body. To these are joined the fore paws, which occupy the space below the mouth; the upper arm and fore arm being turned inward, the fore feet being turned outward under the arm. The hind legs occupy the lateral field on both sides of the head. They are not connected in any way with the body of the animal.

In Fig. 68 we find a novel representation of the killer-whale, which is copied from the painting on a house of the Kwakiutl The sections that have been used here are very compli-First of all, the animal has been split along its whole back towards the front. The two profiles of the head have been joined, as described before. The painting on each side of the mouth represents gills, thus indicating that a water-animal is meant. The dorsal fin, which according to the methods described heretofore would appear on both sides of the body, has been cut off from the back before the animal was split, and appears now placed over the junction of the two profiles of the head. The flippers are laid along the two sides of the body, with which they cohere only at one point each. The two halves of the tail have





Fig. 67.



Fig. 66.

Fig. 68.

Fig. 66 ($_{1}$ %). Part of model of a totem pole with design representing a killer-whale. Tribe, Haida. Height from whale upward, 35 cm.; width, 8 cm.; depth, 6.5 cm.

Fig. 67. Painting from a box front, design representing a frog. Tribe, Haida.

Fig. 68. Painting from a house front with design representing a killer-whale. Tribe, Kwakiutl.

been twisted outward so that the lower part of the figure forms a straight line. This is done in order to fit it over the square door of the house.

In Fig. 69 the same animal has been treated in still a different manner. The figure is also the painting from a house-front of the Kwakiutl Indians. The central parts of the painting are the two



Fig. 69. Painting from a house-front, design representing a killer-whale. Tribe, Kwakiutl.

. profiles of the head of the killer-whale. The notch in the lower jaw indicates that it also has been cut, and joined in its central part. The cut on the upper part of the face has been carried down to the upper lip. The body has disappeared entirely. The cut of the head has, however, been carried along backward the whole length of the body as far as the root of the tail, which latter has been cut off, and appears over the junction of the two profiles of the head. The dorsal fin has been split, and the two halves are joined to the upper part of the head, from which they extend upward and outward. Immediately below them the two halves of the blow-hole are indicated by two small faces, the upper parts of which bear a semicircle each. The flippers are attached to the lower corners of the face. The painting on the face next to the mouth represents the gills.

Fig. 70 is another house-painting of the Kwakiutl, representing the raven. The same principle has been adhered to by the artist who made this painting. The central portion of the figure is occupied by the head of the raven split from its lower side upward so that the two halves cohere along the upper edge of the beak. Then the two halves of the head have been folded



Fig. 70. Painting from a house-front representing a raven. Tribe, Kwakiutl. (1) Lower jaw; (2) tongue; (3) chest; (4) feet; (5) legs; (6) wings.

upward, so that the two halves of the tongues and the two lower jaws appear on each side of the central line. The two halves of the lower side of the body are shown extending in a curved line from the corners of the mouth towards the tail, which latter has not been cut. The wings have been considerably reduced in size, and pulled upward so that they appear over each upper corner of the head. The legs occupy the right and left lower parts of the painting, the feet being disconnected from the thin legs.

In Fig. 71, which is a painting on the margin of a blanket, the sea-monster described in Fig. 24 is represented. The animal is shown here as split in two along its back; but all its parts, except the head, the paws, and the tail, are much reduced in size. The two enormous eyes, and between them the nose, will readily

be recognized. The teeth are indicated by a series of slanting lines under each eye, but the lower jaws of both halves have been The whole body is represented by the thin line extending from the lower outer corner of the eyes upward, then along the upper margin of the painting, and downward again. three dorsal fins are shown over this line,—one-half of each on each side of the back. The arms are indicated by two curves under the line indicating the back. The fin of the arm is shown



Fig. 71 (η_{85}^{*}). Painting from the edge of a blanket representing a sea-monster. British Columbia. Length, 139 cm. Northern

under the fore arm. While all these are of small size, the paw which adjoins the fore arm is shown on a very large scale, the claws turned towards the face. The line representing the body runs towards both ends of the painting along the lower margin until it is merged into the tail, one-half of which is shown on each side. In this specimen the proportions of the body are much more distorted than in any previous case.

The following series of figures are designs found on a number of silver bracelets. The animals represented on these are also shown very fragmentarily.

In Fig. 72 we see the beaver cut in two along its back. face does not need any further explanation. The fore legs adjoin it on each side, the toes being turned inward; but the whole rest of the body has been omitted, except the two halves of the tail, which the artist was compelled to show, because they are symbols of the animal.

In Fig. 73 we recognize the sea-monster, with a bear's head and a whale's body. Here also by far the greater portion of the etching represents the head and fore arms of the monster. fins, that are attached to the upper arms near the elbow, are shown on a rather small scale. The whole rest of the body is of very small size, the two halves of the body, with the adjoining half of the tail, occupying only the outer upper margin of the bracelet. I am not quite clear whether the artist intended to



Fig. 72.



Fig. 73.



Fig. 74.

Fig. 72 ($\frac{E}{2482}$). Design on a silver bracelet representing a beaver. Tribe, Haida. Height, 3.5 cm.

Fig. 73 ($\frac{E}{2481}$). Design on a silver bracelet representing a sea-monster. Tribe, Haida. Height, 3.5 cm.

Fig. 74 ($^{E}_{1463}$). Design on a silver bracelet representing a hawk. Tribe, Haida. Height, 3.5 cm.

represent the two halves of the dorsal fin by the curved ornament adjoining the hat which rises over the nose of the monster.

The hawk which is shown in Fig. 74 has been cut in a different manner, namely, from the beak backward, the two halves being then turned outward. The centre of the design is occupied by the two halves of the head, and the two talons which adjoin it. The wings are cut off from the body, and occupy the outer corners of the design.

The designs on the following series of carvings are no less conventionalized. Fig. 75 is a sea-monster adjusted to a circular slate dish. The carving is perfectly symmetrical; but, owing to an accident, the drawing appears asymmetrical because it has been taken from an eccentric point of view. Here also the centre is occupied by the head of the animal. The tail is seen under the lowest part of the mouth, turned upward in front of the The arms are shortened considerably. They are attached to the lower corners of the mouth, the paws touching the chin.



Fig. 75 (3^{4}_{1}). Slate dish with design representing a sea-monster. Tribe, Haida. Diameter, 36.5 cm.; depth, 7.5 cm.

The fins are joined to the upper part of the arms, and are turned upward so that they lie close to the sides of the face and about on a level with the ears.

In Fig. 76, which represents the front of a small box carved in slate, the same sea-monster is shown. Again we see the animal cut in two, the section separating the eyes and the ears, the mouth, however, being left intact. Here the whole body has been omitted, with the exception of the paws, to which the fins are attached. The paws will be recognized turned inward under the mouth, while the fins extend upward along the outer margins of the slab. The dorsal fin has been bisected, and one-half is shown in each upper corner. The ornament in the centre of the upper margin probably represents the tail turned upward over the back so that it almost touches the head.

Fig. 77 represents the carving on a slate slab. We have here a different representation of the sea-monster, which is also, as we might say, very much abbreviated. The head occupies by far the larger portion of the carving. The body, which is seen underneath

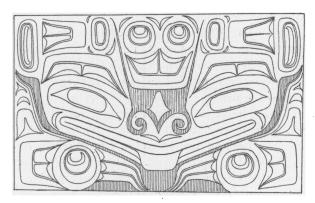


Fig. 76.

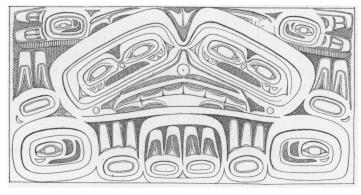


Fig. 77.

Fig. 76 $\binom{48}{18}$). Front of a slate box with design representing a sea-monster. Tribe, Haida. Size, 18.5×30 cm.

Fig. 77 ($7\frac{4}{4}$ s). Slate slab with design representing a sea-monster. Tribe, Haida. Size, 14 x 26.5 cm.

the head, occupying the centre of the slab, is indicated by a comparatively small square with rounded edges, which is decorated with two fins. The rest of the decoration on the lower edge of the slab must be interpreted as the arms of the monster, the large face on each corner representing an elbow. The whole arm, extending from the elbow to the hand, is omitted. The latter is indicated by an oval the centre of which is occupied by an eye. From it rise the three fingers or claws. The important symbols of the monster, the fins, which are attached to the fore arm, are shown adjoining the elbow, and rise along the sides of the slab, outside of the eyes. The two ornaments occupying the upper corners of the slab are undoubtedly the tail of the monster.

The shark which is shown in Fig. 78 is found on one end of a small food tray. I do not need to repeat the description of the shark's face, on which the characteristic symbols will be recognized. I have introduced this figure here in order to show that the whole body of the animal has been omitted with the sole exception of its pectoral fins, which are carved on the rim of the tray on both sides of the forehead. Their position is somewhat analogous to the one found on the totem pole (Fig. 33).

In Figs. 79 and 80 we find the representations of the sculpin distorted and dissected in the same manner as the sea-monster on the preceding figures.

In Fig. 79 the sculpin has been adapted to a circular slate dish. The centre of the design is occupied by a rosette, which has undoubtedly been copied from European designs. In the drawing the outlines of the various parts of the body have been strengthened in order to make their relations somewhat clearer. noticed that the head is split in two, cohering only at the nose and the upper jaw. The two spines rise immediately from the nose. The two halves of the body extend from the corners of the face upward along the rim of the dish. There they grow thinner, indicating the thin portion of the fish body near the tail. tail has not been split, and is turned upward and backward so that it touches the central rosette. A comparison between this design and the design at the centre of the upper margin in Fig. 76 will show a great similarity between the two, thus making it probable, that, as stated before, the latter design is intended to

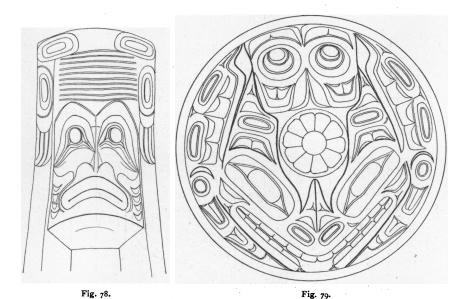


Fig. 78 ($_{1\frac{18}{37}}$). Design from the end of a food tray representing a shark. Tribe, Tlingit. Central length of design, 12.5 cm.

Fig. 79 ($\frac{1}{3}\frac{6}{3}$). Slate dish with design representing a sculpin. Tribe, Haida. Diameter, 34 cm.; depth, 6.5 cm.

represent the tail of the monster. The pectoral fins of the sculpin are shown in a rather abnormal position. They are turned forward from the body so that they adjoin the lower jaw. They will be recognized between the jaws and the rim of the dish. The dorsal fin is indicated by the long pointed ornaments extending from the eye towards the tail.

In the design Fig. 80 the sculpin has been dissected in a some-what different manner. The head occupies the upper margin of the slab. It has a remarkably triangular shape. The body has been bisected from head to tail, and turned and twisted in such a manner that each half extends in a curve downward from the corners of the face to the middle of the lower margin of the slab. The pectoral fins have been left in contact with the corners of the mouth, and are placed in the same position as in the preceding figure, namely, adjoining the lower jaw. They meet just below the chin of the animal. I believe the ornaments which are

stretched along the right and left margins of the slab represent the dorsal fins of the sculpin.

Our last figure (Fig. 81) shows the design of a beautiful Chilcat blanket. In this specimen the distortion and dissection of the animal have been carried further than in any of the preceding specimens. On the design are shown the two profiles of the head, the dorsal fin, the tail, the flippers, and the chest of the killer-whale. In order to understand the design, we must imagine the



Fig. 80 ($\frac{16}{18}$). Front of a slate box with design representing a sculpin. Tribe, Haida. Size, 18.5 x 30 cm.

whale placed head downward, the chest towards the observer. The design on the chest is the large face which occupies the centre of the upper margin of the blanket. Then we must imagine that the head has been cut off, and split and twisted in such a way that the two halves of the mouth are turned outward. Next we must imagine the body of the animal cut through just above the chest, and turned backward so that the tail is placed behind the head. Then the two halves of the head have been moved to the right and to the left in order to allow the tail to appear between the two halves. In this position the dorsal fin would be hidden behind the chest of the animal. In order to make it visible it has been cut off from the back and moved towards the tail until it appears just above the tail; it has been split and flattened so that both halves, the left and the right, are seen under the chest.

Finally the two flippers have been considerably enlarged and twisted in such a way that they occupy the two upper corners of the blanket.

I will add a remark in regard to the frequent occurrence of the eye ornament on all these designs. An examination of our figures will show that in most cases it is used to indicate a joint.

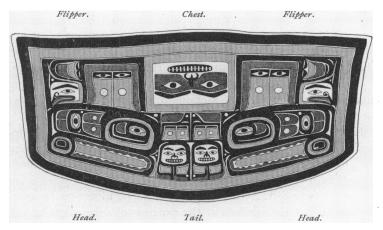


Fig. 81 ($\frac{E}{1747}$). Chilcat blanket representing a killer-whale. Tribe, Tlingit. Width, 156 cm.; height, 77 cm.

Shoulder, elbow, hand, hips, knees, feet, the points of attachment of fins, tails, and so forth, are always indicated by eyes, which, I believe, may best be interpreted as representations of the surfaces of ball-and-socket joints.

We can now sum up the results of our considerations. In the first part of this paper I described the symbols of a number of animals, and pointed out that in many cases there is a tendency to substitute the symbol for the whole animal. The works of art which I described in the second part of my paper may be said to illustrate a principle which is apparently diametrically opposed to the former. While the symbolism developed a tendency to suppress parts of the animal, we find in the efforts of the artist to adapt the form of the animal to the decorative field a far-reaching desire to preserve, so far as feasible, the whole

animal; and, with the exception of a few profiles, we do not find a single instance which can be interpreted as an endeavor to give a perspective and therefore realistic view of an animal. We have found a variety of methods applied which tend to bring the greatest possible part of the animal form into the decorative field. I conclude from this that it is the ideal of the native artist to show the whole animal, and that the idea of perspective representation is entirely foreign to his mind. His representations are combinations of symbols of the various parts of the body of the animal, arranged in such a way that if possible the whole animal is brought into view. The arrangement, however, is so that the natural relation of the parts is preserved, being changed only by means of sections and distortions, but so that the natural contiguity of the parts is preserved.

The success of the artist depends upon his cleverness in designing lines of dissection and methods of distortion. When he finds it impossible to represent the whole animal, he confines himself to rearranging its most characteristic parts, always of course including its symbols. There is a tendency to exaggerate the size of the symbols at the expense of other parts of the subject. I presume this is the line in which the two principles of the decorative art of the Indians of the North Pacific Coast of America merge into each other. The gradual emphasizing of the symbol at the expense of other parts of the body leads in many cases to their entire suppression, and to designs in which the animal is indicated only by its symbols.