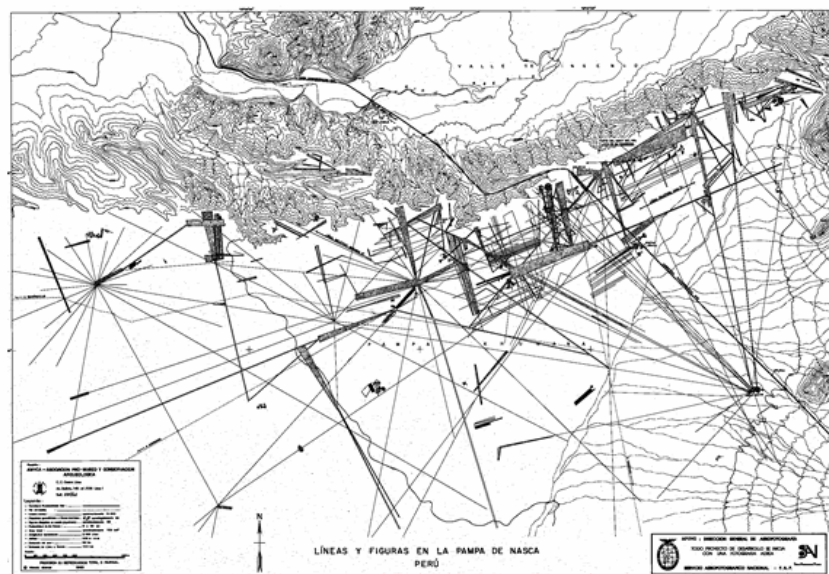


One Interpretation of the Nasca and Palpa Geoglyphs

Eriko Kusuta

(1)

“The Nasca Geoglyphs”, a World Heritage Site, are located in the arid and wild plains which stretch out toward the southern shores of Peru in South America. Covering a vast region of approximately 500 square kilometers between the Rio Ingenio and the Rio Nasca, both offshoots of the Rio Grande, are drawings depicting a monkey, a hummingbird, a spider, a whale and other figures, as well as geometrical patterns, including triangles, trapezoids and spirals, and vast numbers of long lines extending in every direction from these drawings and patterns. (See Fig. 1 Nasca Geoglyph Distribution Chart)



(Fig. 1) Nasca Geoglyph Distribution Chart

As earthenware and textiles from the Nasca period excavated from the Nasca region often have patterns similar to the Nasca Geoglyphs, it is believed that the geoglyphs were created by the people of ancient Nasca, the creators of the Nasca culture.

It is easy to imagine that the people of Nasca, a people who grew cotton and whose textiles display advanced and excellent weaving techniques, had the

ability to conceptualize the expansion and contraction of lines and figures, and that they used their skills to create the geoglyphs.

Although there are various opinions about what the lines and figures mean, we do not yet have any established theories.

In the midst of this search for answers to the mystery of the Nasca Geoglyphs, other geoglyphs were discovered in the Palpa region of northwestern Nasca. This recent discovery includes numerous new ruins and geoglyphs and has shed new light on the Nasca investigations. As a result of these new discoveries, the Nasca investigations have moved into a new stage.

As a matter of fact, researchers have not even agreed upon the dates of the Nasca period yet; however, I will use the date classification (Table 1) presented by the German-based international research team lead by Reindel, a team that is on the leading edge of excavation and research, because their analysis is at present the most reliable.

Relative Chronology for the south coast of Peru.

	Periods	Cultures	Phases
1532 A. D.	LATE HORIZON	Inca	
1400 A. D.	LATE INTERMEDIATE PERIOD	Ica/Chincha	
1000 A.D.	MIDDLE HORIZON	Wari	
600 A. D.	EARLY INTERMEDIATE PERIOD	Nasca	Late
450 A. D.			Middle
250 A. D.			Early
0		Initial-Nasca	
200 B. C.	EARLY HORIZON	Paracas	Late
400 B. C.			Middle
600 B. C.			Early
800 B. C.	INITIAL PERIOD		
1800 B. C.	ARCHAIC		
12000 B. C.			

(Table 1) Chronological Table of Nasca and Paracas

One interesting archaeological find by Reindel in Palpa was made at the Jauranga ruins. The ruins were found to have consisted of three layers, the upper-most layer was from the Middle Nasca Period (250~450 A.D.), the middle layer was from the Paracas Period (400~200 B.C.), and the bottom-most was from 600 B. C.

These facts also make us believe that the transition from what we call the Paracas Culture to the Nasca Culture took place on a continuous line. The people of Paracas may have been nomadic or may have been forced to abandon the area. Leaving their cultural footprints in the northwestern peninsula, the people of Paracas migrated toward the southeast and once put down roots in the region currently called Palpa. Before long, however, they moved farther the southeast and to the land of Nasca for some reason.

What caused these people to leave Palpa? It is known that this region suffered from increasingly devastating droughts and destruction by massive and unexpected floods from the Paracas Period to the beginning of the Nasca Period. Did they leave in search of a better environment and new possibilities? Perhaps an increase in the population required them to seek more space. It is also possible to imagine that the massive weather fluctuations may have caused an epidemic that forced the people to flee the land of their birth for survival.

The recent discovery of traces of pre-Nasca culture in Palpa, however, suggests that a discussion of the geoglyphs requires an approach similar to the method of analysis applied to the cultures. In other words, it might be worthwhile to discuss the geoglyphs in Palpa as a possible origin of those found in Nasca.

(2)

The reason the geoglyphs of Palpa received less attention than those of Nasca may be because the geography of Palpa and Nasca are significantly different.

The Palpa region is strewn with continuous abrupt peaks, quite different from Pampa of Nasca where sands and stone stretch out endlessly over a plain which affords a great deal of visibility. Figures drawn on the mountain side in the Palpa region are less visible, and even disappear depending upon the direction from which they are viewed.

It is known now that mountains in Palpa are not natural mountains but the

build-up of sediment from the northeastern Andes. Later, water running down from the Andes cut the mountains of sediment, forming jagged peaks as time passed and creating a continuous line of many peaks. The big flow created deep valleys where settlements developed. It was here that the town of Palpa found its beginning.

The Rio Palpa in the north and the Rio Viscas in the south are located on opposite sides of the town of Palpa. The mountains of sediment located to the northwest of these two rivers and enveloped by the Rio Grande are called Sacramento, and the region to the southeast of the rivers is called San Ignacio. In each direction, a tremendous number of geoglyphs can be seen. Both the Rio Palpa and the Rio Viscas are branches of the Rio Grande.

What has surprised me on the many occasions I have observed this region carefully from a Cessna is that there are platforms carved out on each of the mountains of sediment whose peaks are relatively flat (plateaus). In fact, there are many more beautifully arranged rectangular and triangular platforms built on these plateaus that loom large before our eyes than there are figures. Lines extend from these as if they were roads traveling down the valley, and the figures are drawn like decorations on the valley wall.

While most of the Nasca Geoglyphs were drawn with one stroke and connected to lines somewhere (Picture 1-a, b), those of Palpa are more varied. Some are drawn with one stroke like those of Nasca, others exist independently on inclined surfaces. While there is a certain degree of consistency in the style of the patterns in Nasca which embody living things, there exist different levels of figures in Palpa.



(Picture 1-a) The Monkey



(Picture1-b) The Hummingbird

Petroglyphs thought to be drawn during the old Paracas Period were discovered in Chichictara, north of Palpa. They are adorable drawings of human beings and animals that look like graffiti drawn by little children. These figures may have depicted the animals that were around them, such as llamas, and people occupying higher stations in the society or high-born and noble people. Many of the figures of people have Tumi, ceremonial knives, in one hand and, in the other hand they hold long bars, possibly a scale indicating a level of rank. There are large decorations or something like a hat on the heads. The figure sitting on a throne is obviously a person of higher rank (Picture 2).



(Picture 2) Petroglyphs of Chichictara

Many of the figures among the Palpa Geoglyphs are similar to these petroglyphs or have human or god-like features related to these petroglyphs. People everywhere and at all times who hold power seem to carve figures of themselves in conspicuous places in order to show off their power. Or it is possible that people in Palpa carved the figures of socially higher ranking individuals in order to express how important the area was. It is speculated that these figures are among the older Geoglyphs. We can see a transition in creative ability in a great number of the figures of human beings that is suggestive of different time periods (Picture 3).



(Picture 3-a)
People wearing hats



(Picture 3-b)
Three people

Then, at the end of this set of figures, platforms on the plateaus of sediment are positioned as if to show direction.

They created special spaces utilizing and smoothing these flat plateaus on the mountains of sediment. I imagine that the ground was, perhaps, landscaped as necessary. It may not have been such a difficult thing to cut the tops of the sediment mountains. People acquired these spaces in order to use

them and utilized them effectively to create platforms (or it is possible that they cut spaces to the necessary size and flattened them?).

Originally, these lines might have been roads leading to the platforms. The figures drawn on the rock walls may have been decorations to indicate where platforms were or to set the platforms with.

In other words, it is thought that the most important of these geoglyphs, in fact, appeared on these platforms after people started creating them.

These spaces were acquired as places for dozens or hundreds of people to gather close to heaven, on ground higher than the surrounding area and enclosed by straight lines. These places might have been meeting places for the people in the region to offer prayers. When I stood on one of these platforms in 2004, I just felt that this was so. Research shows the discovery of traces of human traffic, stone ornaments as markers, textiles, pieces of earthenware and spondylus shells. The idea of the people gathering together at platforms is not anything new in Nasca research; however, the geography of Palpa gives assurance to this idea and many hints allow us to speculate on the details as well.

People in Palpa might have created meeting places in each settlement (tribe) by flattening the appropriate mountains of sediment. The sizes of the meeting places were different depending on the number of people belonging to the tribes. They also extended several lines for people to make their way to the meeting place from several directions. They carved the figures of powerful people in the region and their precious animals, lamas, as people decorate stained glass and carve statues of saints in western churches.

The figures went through changes from human beings to deformed iconography and geometric figures. This is not disconnected to the fact that people in Paracas who had advanced textile techniques actualized their talents in drawing by simplifying lines. They might have discovered that it was easier to expand and draw simplified patterns. There are many geoglyphs drawn as if the artists were showing off their new techniques (Picture 4). They might have competed in drawing the different patterns with each settlement using their own techniques.



(Picture 4-a) The Sundial



(Picture 4-b) The Stars

Ceremonies offering prayers must have been conducted at the platforms. There must have been music there too as it has been used effectively for religious ceremonies in all ages and cultures — Shinto, Buddhist, and Christian alike. Various instruments have already been excavated from Nasca ruins.

Priests (exorcists) may have organized people and performed their rites to improve their own standing. Is it possible to think that because of this need, they started lines from the platforms, drew figures of something and came back to the platforms? This was probably the beginning of the one-stroke geoglyphs. Priests (exorcists) prayed following the lines carefully and impressed people by their communication with god. The width of the lines in the figures is usually only enough for one adult foot. It is difficult for several people to wedge their way together; however, one selected petite Indian priest who was a descendent of the Mongoloid race could have traced the lines cleverly.

There is an interesting example. This geoglyph called “Bird” seems to show a transition by periods (Picture 5). First, a rectangular platform was created on the plateau they chose for the required number of people. Then, the figure of the bird was drawn on the remaining space of the plateau continuing from the platform, for the purpose of the priest’s demonstration. But it is possible that the space on the platform was not large enough afterwards because of an increase in the population of the tribe. It required an expansion of the meeting place; however, the space on the plateau that people could occupy was limited so that they may have, in the end, needed to expand the platform itself by breaking down a part of the figure of the bird.



(Picture 5) The Bird

There are many examples of the same figures drawn overlapping one another (Picture 6). This spiral is a representative example of this. Possibly because of the change in priests over the generations or some other reason, others drew the same figures in slightly different locations in order to indicate the power of the next generation anew as they took over the ceremonies. Each geoglyph might have been taken over as a symbol of each settlement and used preciously as if the tribe were holding up its own emblem on a flag.



(Picture 6) The Spirals

Before long, people who had lived in Palpa had to consider moving to the southeast for compelling reasons.

According to Reindel et al., it was around 1800~800 B.C. when people moved into Palpa. This region had plenty of water at that time and was able to be used as meadow land. It entered a dry period during the Paracas Period (800~200 B.C.). As it entered the early Nasca Period, the population increased and trading relations with the highland and coastal areas of the Andes were established; however, the weather was becoming more serious. Desertification worsened while unexpected flooding devastated the region a number of times. Therefore, people were forced into the situation where they had to move out of the area.

Did the fear of natural wonder cause people to offer prayers at the platforms? That might have meant an entreaty for the water of life being made peacefully and fully.

What was the bewilderment for those people who moved to the Pampa of Nasca? It must have been impossible to find any place higher or closer to heaven for payers throughout that endlessly flat plain.

Nevertheless people still tried to keep the customs of Palpa.

With platforms that were suggestive of the vast plateaus of Palpa, and lines connected to these platforms as long roads, a number of meeting places

with geometric patterns similar to those in Palpa were drawn. The canvas expanded without limit. Various sizes of figures connected to platforms were created. There is no doubt that people suffering a serious water problem connected figures with water. Continuing analysis since the early stage of geoglyph research shows that both the zigzag patterns seen here and there and the continuity of the straight lines, repetitive and pleat-like, indicated the streams of water.

I believe that such circumstances brought the larger-sized and more complicated geoglyphs to the Pampa of Nasca.

Until now, the concrete patterns such as the Monkey and the Bird have attracted most attention and have been discussed greatly; however, these are rather incidental. The major geoglyphs are the trapezoidal and triangular platforms.

There are various opinions as to the directions that these lines point out, and I feel there is not one, but several explanations for them.

These lines might simply be paths from the settlements or lines created from carefully planned principles. The lines may sometimes have been drawn in the direction of an astronomical object that informed them of the arrival of specific seasons by the sense of the leaders of the society. It seems to be impossible to settle on only one interpretation for the meaning of the lines, lines which have been intricately intertwined with one another over the centuries.

(3)

Cahuachi, the largest ruins in Nasca, is known as an immense ceremonial center, and a long-term excavation was conducted by an Italian team lead by Orefici.

Ruins with the exact same structure as Cahuachi were uncovered at the Los Molinos excavation in Palpa by the Nasca-Palpa Project.

Both sites are located near rivers and on higher ground. Cahuachi is along the Rio Nasca and Los Molinos is located on a section of the Rio Grande just before it branches off into the Rio Palpa. The land stretches out in the direction of the rivers and has a panoramic view of the area.

Reindel believes that Los Molinas was in use between 500 and 250 A.D. The time that construction began must be traced back even further.

According to Orefici, Cahuachi was built between 150 B.C. and 200 A.D.

It is possible that both of these peculiarly similar ruins were created with the same purpose.

If the geoglyph platforms were places of worship for each settlement (tribe), it is natural that they would have required buildings that served as centers of these places as the society grew larger. They were places with both political and religious meaning.

Can't you picture Los Molinos as being for the people who decided to stay in Palpa, and Cahuachi as being for people who found their hope in Nasca?

Los Molinos was suddenly abandoned. Reindel believes that the people abandoned Los Molinos after predicting the massive floods that were to come.

Obvious evidence that sacred ceremonies were actually performed here has not yet been found in Los Molinos. When we consider the possible gradual changes in Cahuachi over the years and its finally being established as a ceremonial center, it is possible to imagine that Los Molinos was abandoned because of the change in the climate in the middle of a similar transition.

Under these circumstances, Cahuachi might have become the ceremonial center of the Nasca culture.

In Japan, a country with the same Mongoloid roots and located an ocean away, Ise Shrine in Ise City, Mie Prefecture, is the leading shrine nationwide. (To be accurate, it is simply called "Jingu" which means a major Shinto shrine. Jingu in Japan means Ise Jingu (Ise Shrine)). Surprisingly, though not well known, there are 125 shrines scattered throughout Ise town. The shrine of each tiny local precinct is closely related to the daily lives of the people. This is where the gods of nature, such as the moon and the wind, and the mythical gods reside. The Naiku, the biggest shrine of Ise, looks down upon the Isuzu River to the front as the head of all these small shrines in order to guide them and welcome pilgrims. It is also a sacred place for people in high positions to visit for prayers.

The same structure can be seen in Nasca culture – platforms where people met daily and worshipped and buildings placed on higher ground looking down upon streams as political and religious centers.

We can imagine more. Ise Jingu (Ise Shrine) actually has two centers. One is the Naiku that enshrines Amaterasu Omikami, the Sun Goddess. The other center is the Geku that enshrines Toyouke no Omikami, the God of Fertility. Both the naiku and Geku have the same structures. It may be interesting to think of

Cahuachi and Los Molinos as being the same combination of the Naiku and the Geku.

Perhaps it's not too much to think that the ruins known as Estaqueria, which are near Cahuachi, might have served as the residence of unmarried princesses who devoted themselves to the service of the gods and prepared for sacred events, just as the Saiku (the residence) did for Saio (the princesses) at Ise Shrine.

As the music and dance of Kagura was inspired by sacred events in the Shinto religion, something which in turn inspired the art of Japanese dance as an art form unconnected to sacred rites, so might the Geoglyphs of Nasca have been inspired by the sacred rites performed on the platforms but developed to completion as a purely visual art separate from these sacred rites. This explains why these magnificent figures drawn on the land have continued to attract people for over 2000 years.

Postscript

This paper is based on ideas that occurred to me during my journey to Nasca and Palpa when I was involved with the establishment of the Palpa Museum as a part of the Nasca-Palpa Project in 2004. I appreciate having had the opportunity to visit these sites as someone who has loved Nasca for more than 20 years. I would also like to express my appreciation to all the people who guided me to this endlessly attractive world.

Figure 1 and table 1 shown in this paper were offered by Dr. Markus Reindel of the Deutsches Archaeologisches Institut.

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