

Cultural Heritage and Economic Theory

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I - Introduction - Validity of the Relationship

A few years ago, at meetings of the World Heritage Committee, several delegates used to ask: « We are very proud to we have a site on the World Heritage List, but what next? What do we do with this listing and with the site ». And when you discussed their question, you found out that they were really questioning the very function of the listing. They were telling us that protection, that “patrimonization” at its highest level - that of World Heritage - was very attractive, but they wanted - and needed - more. We were left with the very question of value, of utility, of the role of « heritage ».

National laws on heritage, the ICOMOS charters and other recognized texts, the World Heritage Convention remain silent about these ‘other’ functions. According to such texts, if we protect, it is because the deterioration or the disappearance of the object of protection - the cultural or natural heritage - constitutes a harmful impoverishment of the heritage of the nation or, in the case of the World Heritage, of all the nations of the World. Nothing is said about social, economic, political functions of cultural heritage.

However, as can be seen all over the World, there is a growing “demand” for heritage, enlarging more and more the scope of the concept. This demand is not driven by heritage specialists only - though they do contribute to the increase demand - but rather by the ‘consumers’ of heritage: the population at large, and the tourism sector. This demand introduces in the concept of heritage more and more monuments and ensembles which, some years ago, would have never been considered. A small square in a town, a well ornated façade or even a small village fountain, a

pedestrianized quarter, an old mill or factory are all attractions for investors and consumers and fall progressively under the label of "heritage".

Needless to say, all this fuzz about heritage does not benefit heritage as identified by the texts, an object, a monument which we should transmit to our future generations because of its intrinsic values - memorial, historic, representation of the genius of humankind, of dead cultures or civilizations. Rather, it is the use, the economic value, the returns expected that make nowadays heritage so interesting, appealing, and that so many are more and more interested in listing more heritage.

Would an economic reading of heritage help in its protection through the understanding of its possible functions and the limits of its use ?

II - Origins and Contents of the Concept of Cultural Heritage

A - Ancient Greece

Although the word "patrimoine" - translated in English by Heritage - comes from the Roman "*patrimonium*" (from *Pater Monere*), its origins can be traced back to Ancient Greece when it represented the family land, the estate that produced the family's basic commodities. It could neither be traded nor sold : it was to be transmitted from one generation to the next.

It seems that the concept started under the economic regime of what has been called the "*oikos*", a non-market economy¹ where, according to Johann Karl Rodbertus², a German economist of the 19th century, it symbolised the family estate. This concept and the economic system built up around it met with some criticisms: the controversy was between the "modernists" who believed that Greece's economy was very advanced and structured and the "primitivists" who considered it to be "archaic".

¹ This part is based on the works of K. Polanyi and C. Arensberg, « Trade and Markets in the Early Empires - Economies in History and Theory » The Free Press, New York, 1957.

² See Karl Rodbertus, « Economic Life in Classical Antiquity », published between 1864 and 1867 and cited by Polanyi and Arensberg, op. cit.

Because of historical confusion - there is no exact reference to a well identified period, and of the controversy surrounding it, the word "*oikos*" became an easy tool to explain the "natural economy" in which money, markets and trade had little impact of the whole system of production. In such an economy, the family had to possess its means of production since it was impossible to address its needs through emerging and little monetarized markets which were functioning through a system of barter.

In a recent book³, a French archaeologist, Alain Bresson, confutes the theory of K. Polanyi and C. Arensberg on the economic system of Ancient Greece. According to Bresson, there was no such system as the *Oikos*. There were markets which operated, and, even if they were based on barter trade and if they were little monetarized, their importance on the life of the Greek cities was much bigger than Arensberg and Polanyi thought. These markets were necessary to feed all the inhabitants of cities which did not all possess all the necessary agricultural tools of production to address its basic needs.

Cities traded regularly, exchanging their products, since no single one could provide its population with all the necessary commodities - grains, meat, vegetables and fruits, oil, wine, as well as cloth, leathers, iron and copper, etc. This means that these trading cities had a surplus of production (*Prosodoi*) and that the peasantry, the farmers, were not living in autarcy; hence the increasing necessity of markets. But Bresson also writes:

« Selon les lieux et les époque, la part de la production consommée par les producteurs ou mise sur le marché intérieur dut varier sensiblement **sans que jamais l'autoconsommation ne cessât d'être un modèle dominant** (ce qui ne veut pas dire un modèle exclusif). Mais même l'autoconsommation n'est pas contradictoire avec la mise sur le marché d'une proportion importante de la production. »

By recognizing the continued presence of self-consumption - of autarcy - as the dominant pattern, Bresson implicitly recognizes the very difficulty of selling or exchanging the family estate. This unwritten law of behaviour is

³ Alain Bresson, « La cité marchande », Ausonius-Scripta Antiqua, Bordeaux 2000.

still with us and remains applied in certain mountainous regions around the Mediterranean where the arable land is scarce and where the parcel of land that surrounds the "pater familias" house is never sold nor divided by inheritance. It is, in a way, inalienable and is always transmitted to the eldest of the sons, unless it is turned into a main-mort domain, a "wakf".

Joseph Schumpeter further clarifies the rationale of the Graeco-Roman economy when, in his "History of Economic Analysis" (1954), in Chapter I, "Graeco-Roman Economics", he writes:

"... their Oeconomicus (*oikos*, house, and *nomos*, law and rule) meant only the practical wisdom of household management; the Aristotelian *Chrematistics* (Possession of wealth), which comes nearest to being such a label, refers mainly to the pecuniary aspects of business activity."

And he further continues:

"Greek thought, even where most abstract, always revolved around the concrete problems of human life."

On this period of Ancient Greece and on the importance of agriculture in its economy, Fernand Braudel writes about "The Land or the Commodity"⁴ by reminding us that land is the true value. It is the major production factor with manpower. Accumulation of wealth came through the accumulation of land and labor (for the latter, the *hectémores* being the ideal example). This wealth - wheat, olive oil, etc. - had to be traded, exchanged and this could take place only in the presence of markets and of specialized traders.⁵

⁴ In his posthumous work « Les mémoires de la Méditerranée » (Ed. de Fallois, Paris 1998),

⁵ « Bien sûr, la terre est la grande réalité de base. Au moment du vaste essaimage de ses hommes, la Grèce est un pays agricole, d'économie archaïque, mal doté en vérité : peu de terres arables, moins encore de terres de qualité. Dès que la population augmente, des colonisations intérieures s'imposent, mais leur élasticité est réduite : la pioche des défricheurs ne s'arrête pas seulement contre les pierrailles ou la racine noueuse des arbres, elle est condamnée par les faibles rendements de toutes les terres marginales. ... D'elle même, la difficulté se transpose en termes sociaux. C'est le nombre trop élevé des petits paysans acharnés à partager un maigre héritage qui les livre à l'exploitation de quelques grands propriétaires, et fait d'eux des *hectémores* - des tenanciers qui livrent probablement chaque année les cinq-sixième de leur récolte - les endette vis-à-vis des riches et rend un jour ou l'autre « la terre esclave ». ... Le processus de paupérisation pousse des hommes vers des rivages lointains, une fois que la colonisation intérieure est achevée, une fois que ses limites sont atteintes. C'est pour saisir le blé des pays peu peuplés, ... Mais ce blé, il faudra le payer. Le plus souvent avec du vin, de l'huile - produits agricoles riches - et avec des produits manufacturés. Or, sans l'intervention de marchands déjà spécialisés, il n'y a pas d'échange ... Il y a donc eu, dès le début de l'émigration ou peu s'en faut, des marchands et des calculs mercantiles, et même des colonisations à motivations marchandes. »

Thus the "*patrimoine*", heritage, gained the status of non-exchangeability. It is in this context - which became the subject of lengthy debate among the economists of the late 19th and early 20th century⁶ - that the concept of the "*patrimoine*" which could neither be sold nor traded, emerged ; a concept which would gain weight and recognition throughout the 20th century.

In his major work⁷, Edward E. Cohen points at the change which took place in the Athenian economy between the fifth century BC and the fourth. It is at this period that Cohen places the emergence of monetarized markets and the beginning of the decline of the *Oikos* system. While in the fifth century, the basic building block of Athenian society had been perceived as self-sufficient, producing for one's own consumption, by the fourth century, agricultural products were increasingly being raised for cash sales. The *Oikos* started then its decline and progressively disappeared except from very isolated places.

Before moving on, a word of caution is necessary: one must keep in mind that the distinction between pre-market and market economies (that between the modernists and the primitivists) serves us to avoid an "*inversion of perspective*" which, as Polanyi puts it, could lead to read into Antiquity "modern" phenomena which in reality are archaic or primitive : the "*patrimoine*" of Ancient Greece (i.e. the *Oikos*) may be the father of our "*patrimoine*", but it is of a different ilk and serves different purposes.

Let me also point to a word, a concept, which we will see again in our reading of economics and heritage, that of Surplus - the Greek *Prosodoi*.

B - "Heritage" as we Understand it

Roman law reinforced the notion of family heritage by introducing a quasi identification between the "*Pater familias*" who is its protector and transmittor and the "*patrimonium*". The "*pater familias*" brings to the

⁶ That of the type of economy in classical Greece : primitive or early modern ?

⁷ Edward E. Cohen, « Athenian Economy and Society - A Banking Perspective », Princeton University Press, 1992.

"patrimonium" his personal values - the intangibility of his social status, together with the personal obligation of its transmission.

It is usually agreed that the institutionalisation of the notion of "common heritage" and the introduction of intangible values in the concept of "Heritage" were brought about by the French Revolution.

In 1792, the revolutionaries begun destroying physical representations of the « Old Regime » : castles, palaces, private domains, monasteries, churches. The Convention, which headed the Revolution, became alarmed by the loss of wealth caused by this destruction and decided to protect the "monuments"⁸. It entrusted a special commission with this task. The purpose of such protection was twofold:

- To protect the wealth of the country and put it at the service of the new regime ;
- To give this new regime an historical dimension, and root it in tradition, thus legitimizing it : from belonging to a family or a community the monuments became the property of the State.

It is then that the concept of "national heritage" was born. With this "national heritage", the French Revolution created the artistic memory, the notion of monuments and the heritage of forests and estates.

This was followed by the listing of monuments and sites (in 1810 by the French Minister of the Interior, Alexandre de Laborde). Once these lists were published, the bourgeoisie was keen to visit the sites, thereby starting the first "tourism" activity, and then called *"excursions"*. From the list of monuments, it became easy to move to the "classification" of these monuments according to their order of importance (1834, Prosper Mérimée).

With the Industrial Revolution, two important phenomenons occurred from the point of view of heritage. First, the bulk of production, of revenue generation, was no longer driven by agriculture. Industry took over, thus relieving the land, the estates, of a large part of their economic function, and

⁸ The original meaning comes from the Latin "monumentum", derived from the verb "monere", to remind, to alert.

therefore widening the gap already opened by the French Revolution between the concept of heritage, of "*patrimoine*" as we know it now and the original meaning of the Greek (the *oikos*). Second, a large economic surplus (here again, the Greek *Prosodoi*) was generated thanks to the new production processes and the colonies. This surplus enabled the State to devote more of its resources to the protection and enhancement of its "national heritage" which was increasingly becoming a heritage of beauty, of aestheticism, of picturesque sites. Romanticism prevailed.

Meanwhile, the results of discoveries and exploratory expeditions, which Europe was hearing about thanks to the emerging media, together with a new "universal thinking" were pointing to the notion of a single world, a single humanity. The search for universality was also challenged by the destruction taking place in European cities and in the colonies owing to the pressures of economic growth and the needs of emerging industry.

The modern notion of "*patrimoine*" - which already lost much of its economic value was born under specific economic circumstances : those of the Industrial Revolution in Europe, i.e. once agriculture was replaced by industry as the main sector of production. The "*patrimoine*", initially land related, was no longer needed to produce the wealth of the Nation.

C - Different cultures, different contents

If the concept of heritage in the Western World is so different - for example - from the African concept of heritage or from that of the Pacific Islands it is because these regions have not experienced the same economic and political processes as the Western World. In such places, the spiritual value of a site, of an object or of a monument remains the main reason for protecting it and ensuring its conservation as part of the "*patrimoine*".

Moreover, the availability of materials has influenced the types of techniques used and of "*patrimoine*" built up, while each type of material has determined the development of specific building techniques and of art.

In the civilizations of “stone” constructions for example, monuments have survived down through the centuries: most of these monuments are cathedrals or places of worship or erected for the dead (Egypt). The same applies to the prehistoric sites so far uncovered.

But creativity is the product of our environment as much as of our needs. In her book “The Conditions of Agricultural Growth - The Economics of Agrarian Change under Population Pressure” (1965), Ester Boserup, a Danish economist, has explained the process of technological innovation, based on demographic pressures on arable land. Similarly, the French anthropologist André Leroi-Gourhan, has shown the impact of the environment and of the materials available on the techniques developed by humankind: technological innovation is brought about by human needs whilst the types of materials available determine technical innovation, and the sorts of tools developed.⁹

In Japan, temples are built of wood and their builders have devised very specific techniques in order to withstand earthquakes - the balancing effect of the roof supporting poles. In civilizations or cultures of “earth”, builders have privileged form and elaborate façades. Where nomadism or pastoralism was the rule, places of worship and sacred places were natural - as opposed to man-made areas.

Religious monuments of worship are as much the product of the architect who has designed them than of the very many workers who have built them. Although we assign to these monuments cultural functions (religious), we should not lose sight of their social and economic function which can be compared to those of the modern large scale public works undertaken, for example, to revitalize the economy after the Great Depression. In limited monetarized markets or local markets, it was necessary at times to redistribute wealth from the landlord or the Church and to provide food for the poor. Social cohesion in times of hunger or war could also be achieved by such large scale, labour-intensive projects.

⁹ See: André Leroi-Gourhan, “Evolutions et techniques”, V.1 “L’homme et la matière” & V.2 “Milieu et techniques”, Albin Michel, Paris 1943 & 1971.

Here again, we run the risk of looking at things from the past through our modern eyes, ascribing them values which their builders or owners had no notion of.

As Sir Alan Peacock, the British economist, reminds us¹⁰,

“A large proportion of artefacts are not produced with the idea of reminding us of our past ... they become identified as heritage goods usually by archaeologists and historians who have obtained some form of official recognition or public acceptance of their status as experts in determining their artistic or historical significance. These experts exercise a pronounced effect on the accretion process which is reinforced by their influence as holders of senior positions in the heritage services which are provided by public institutions not normally subject to market forces.”

The difference between the economic role played by these monuments when they were being built and the economic function of infrastructure projects of modern times derives from the very limited “investment multiplier” effect these monuments could have. The goods created by the construction of these monuments had little impact on the rest of the economy.

D - The introduction of Beauty and Aestheticism

Some words are necessary here on **beauty** since it has become a major reason for listing a site or a monument and the most powerful attraction for tourists of all races and nations. Again, we return to Greek civilization and particularly to Plato whose reflections on “beauty” have influenced all western thinking. In one of his “discourses”, “Hippias Major”, Plato says of beauty that “there is a beauty in itself which ornates all other things and makes them appear beautiful when this form is added to them”. The word used by Plato for form is “*eidos*”, the idea - which, in this sentence, is

¹⁰ “A Future for the Past : The Political Economy of Heritage”, The British Academy - Keynes Lectures in Economics; read on 27 October 1994 at the British Academy and published in December 1995 in the *Proceedings of the British Academy*.

nothing but beauty itself. And today, we list, protect and classify “beautiful” places and monuments quite often for very personal, subjective, psychological reasons.

It is during the industrial revolution that the memorial function of the monuments gradually started to be replaced by art, a trend begun during the Renaissance. Previously, the function of a monument was to remind us of deity, of power, or of a victory. Perfection in construction as well as the ornamental aspect of the monument were sought, but not necessarily beauty.

Until the XVth century “art” (from the Latin “*ars*”, i.e. activity, know-how), referred to a set of technical activities, related to a trade. The idea of aestheticism, as we understand it, only appeared when art gained recognition, through its new acception, as an intellectual activity which could not be reduced to a single technical task.

This happened once again as a result of a change in the economic process. The transition from a small scale production system (*artisanal*) to a capitalistic mode of production radically changed the status of the artist. This change released the artist from the domination of the guilds and their feudal structures. In the Middle Ages, the object of art had to conform to the requirements of the commissioner to meet its future functions (religious, ornamental, celebration,); this was gradually changed and more freedom was left to the creativity of the artist. At the same time, the price of works of art increased drastically. Prices no longer related to the materials used; instead they reflected the reputation of the artist, his market value.¹¹

The intrusion of beauty, aestheticism and of picturesque, which has developed a quasi psycho-analytical bond between us and our cultural “heritage” has provoked an inflation of this “heritage” at all levels of social organization : local, regional, national and international, even though the meanings of “heritage” or “patrimoine” are not shared by all cultures in the World. Sometimes, the concept of “heritage” or “patrimoine” simply does not apply. Nevertheless, there is a growing “heritage” market in our world and it

¹¹ On art and aestheticism, see : Marc Jimenez, “Qu’est-ce que l’esthétisme ?”, Gallimard, Paris 1997.

has entered an inflationary spiral¹². In a sector - that of heritage - where the supply of goods is limited by the sheer nature of these goods - you cannot produce archaeological sites or the Pyramids or a cathedral - their availability is finite, our modern societies are creating more « heritage » by enlarging progressively the notion of heritage which includes more and more recent monuments; this reduces further the market value of such goods.

III - The Economic Values of Heritage

Must heritage have an economic value? If we were to follow John Maynard Keynes, then the answer is yes. It is not only a matter of intrinsic value, but rather, according to Keynes a matter of use value. He once suggested that if artistic resources were not fully employed, then it would be worth knocking down the majority of buildings in South London next to the Thames and replacing them with the best of contemporary buildings and parks laid out like St. James's.¹³

A - The Different Types of Value

Tourism, which is becoming a major sector of the economy, is not the only source of economic value for heritage. Ismail Serageldin provides us in his last book at the World Bank¹⁴, with a very clear list of the economic values of heritage.

From the more tangible to the intangible values, Serageldin divides the Total Economic Value of Cultural Heritage Assets in two major categories: the Use Value and the Non-use Value. Between these two categories lies the "Option Value". The explanations provided by Serageldin are best to understand these different values:

“ ... Total economic value is usually decomposed into a number of categories of value. [It] generally include the following:

¹² Remember Alan Peacock's extract above.

¹³ In Alan Peacock, *op. cit.*

¹⁴ « Very Special Places : The Architecture and Economics of Intervening in Historic Cities » . Ismail Serageldin, The World Bank, 1999.

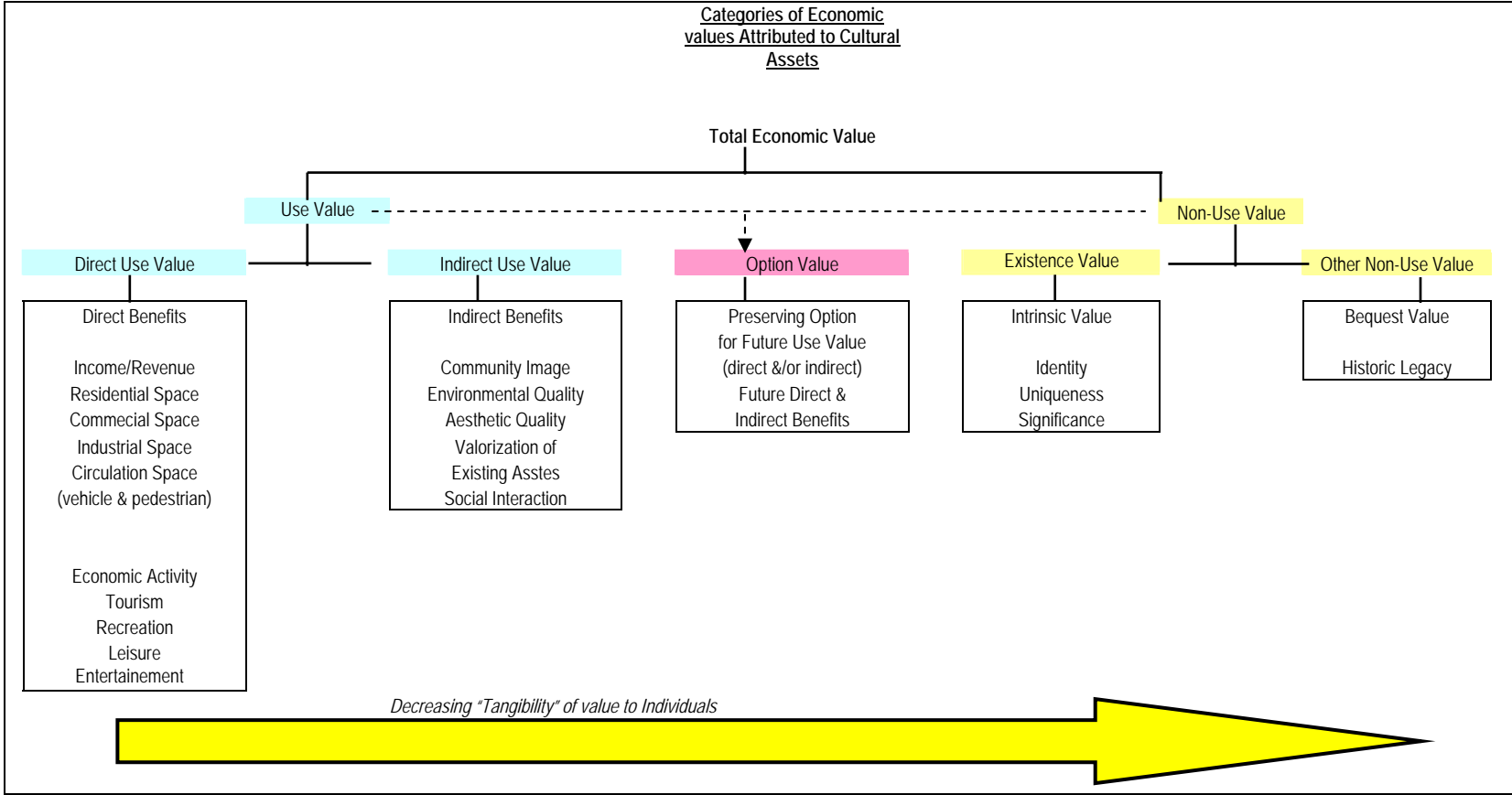
- Extractive (or consumptive) use value,
- Non-extractive use value and,
- Non-use value.

Extractive use value. Extractive use value derives from goods which can be extracted from the site. ... In historic living cities, there are direct uses being made of the buildings, for living, trading, and renting or selling spaces. ... Unlike a forest, the use of a historic city does not deplete it unless the use is inappropriate or excessive, denaturing the beauty of the site or the character of the place. At some level, a parallel exists to extractive use of a forest being kept at sustainable levels.

Non extractive use value. Non-extractive use value derives from the services the site provides. ... The parallel for historic cities is clear: some people just pass through the city and enjoy the scenery without spending money there, and their use of the place is not captured by an economic or financial transaction. Measuring non-extractive use value is considerably more difficult than measuring extractive use value. ... Those likely to have the most relevance to the valuation of cultural heritage are aesthetics and recreational value:

- *Aesthetic value.* Aesthetic benefits are obtained when the fact of sensory experience is separate from material effect on the body or possessions. Aesthetic effects differ from the non-use value because they require a sensory experience, but aesthetic benefits are often closely linked to physical ones.
- *Recreational value.* Although the recreational benefits provided by a site are generally considered together as a single source of value, they are a result of different services which a site might provide. ... A historic area could have rest stops, vistas, and attractive meditation spots, in addition to shopping bazaars and, of course, monuments....

Non-use value. Non-use value tries to capture the enrichment derived from the continued existence of major parts of the world heritage. Even if not likely to visit these sites, one would feel impoverished if the sites were destroyed. In many cases, this benefit is referred to as *existence value* (the value that people derive from the knowledge that the site exists, even if they never plan to visit it) ... Other aspects of non-use value include the *option value* (the value gained from detaining the option of taking advantage of a site's use value at a later date, akin to an insurance policy),... Non-use values are the most difficult types of values to estimate. Yet, this category of value has obvious relevance for the assessment of cultural heritage sites."



B - The Economist's Perspective : Estimating Value

a) The "Welfare Economics" Approach

Three methods are commonly used to estimate the economic value of heritage: the Contingency Valuation technique is the most renowned. There is also the Transportation technique and the Hedonist method.

The contingency valuation technique is a direct product of Welfare economics, a sector of economic theory dealing particularly with the provision of public services and the well being of the community. Contingency Valuation is based on a survey conducted among representatives of the target population potentially interested in a heritage element. This sample is asked about its Maximum Willingness to Pay (MWP) to secure a public service or avoid its loss or deterioration.

Applied to a heritage element, this technique enables the decision-makers to estimate the economic value the society gives to a given heritage, thus providing basic information for the cultural heritage policy to apply.

At its beginning, during the sixties, Contingency Valuation was more a theoretical tool and its first applications were geared towards the valuation of protecting natural and recreational areas. It has become nowadays used regularly by a variety of actors - from national decision makers to international organizations - and is used for all types of cultural goods, from museums collections to sites and historic cities.

Examples are numerous and vary from valuing the public benefits of heritage listing of buildings in Sydney¹⁵ to road options for Stonehenge¹⁶ through the case of the Musei Aperti in Naples¹⁷.

Even though this technique can help the decision-makers by showing public preference and readiness, it is not a tool which can estimate the

¹⁵ Peter Abelson, "Valuing the Public Benefits of Heritage Listing of Commercial Buildings - Prepared for the New South Wales Heritage Office", Sydney, November 2000.

¹⁶ David Maddison and Susana Mourato, "valuing Different Road Options for Stonehenge", CSERGE - University College, London.

¹⁷ Walter Santangata and Giovanni Signorello, "Contingent Valuation of a Cultural Public Good and Policy Design : the Case of 'Napoli Musei Aperti', Journal of Cultural Economics, 2000.

economic role or value of heritage. It therefore estimates the value people place in heritage and not the possible role of heritage as an economic agent.

There is, in my view, another approach worth envisaging: since at its beginnings, heritage was basically an economic factor and is now being more and more considered for its ability to generate revenues, one can consider heritage as an economic commodity and try to analyse its economic role and returns. In this framework, heritage becomes an economic "asset", since its protection and management represent "future economic benefits".¹⁸

b) Heritage as a commodity¹⁹

In this perspective, the total economic value of a site can be considered to be at least equal to the total revenues its various uses generate over time, its most intangible values being impossible to calculate.

Therefore, to maximize its value as well as its return to the economy, the lifetime of a cultural site must be as long as possible since, as opposed to other "commodities", a cultural site is unique and cannot be replaced : when a tool becomes obsolete, we can buy a new one ; there is no such thing in cultural heritage since whatever the value of, say, a building by Sir Norman Foster or Frank Lloyd Wright, never in our foreseeable future, can they replace a roman amphitheatre. They are simply different and each one is unique. The fact that any heritage site is unique and cannot be replaced gives it a special economic value.

The second limitation to this economic perspective of heritage derives from that peculiar perception and that personal relationship we have with cultural heritage. It is this perception and this relationship that tell us how much, in almost monetary terms, is our heritage worth.

¹⁸ A very instructive study has been prepared by Helen Tyzack, "Recording the value of museum collections in financial reports : issues", Australian Key Centre for Cultural and Media Policy - University of Queensland, 1998.

¹⁹ A great number of economic studies have been carried out on heritage sites or cities or monuments as being an economic tool. See inter alia : (a) Bath City Council, "Economics of Tourism in Bath, Feb. 1987; (b) New Zealand Historic Places Trust, "The Economics of Heritage Buildings - A Contribution to the Historic Heritage Management Review" ", 1998; (c) Timothy Ambrose ed., "Money, Money, Money and Museums", Scottish Museums Council, 1991; (d) "Economic Values of Protected Areas", Adrian Philips ed., in Best Practice Protected Area Guidelines Series, Cardiff University and IUCN, 1998.

This imposes upon the custodians of the site the duty to ensure its full protection, so as to enable it to last as long as possible. The site must not be consumed rapidly ; better still, it should not be consumed at all.

This extended protection has an economic return known as the “reward of waiting”²⁰ or the “reward of abstinence”. Instead of spending, consuming or simply destroying a heritage site, its owners - State, local community, private owner - decide to keep it. This decision could well have been taken against a possibility of high returns from a tourist or construction operation. Since heritage sites are not abundant and will never meet the exceeding and ever increasing demand - to quote Mrs Robinson - there should be property in them in order that they may be used in an effective manner. It is the scarcity of these capital goods which makes income from their property possible. How does this apply?

Let us now consider that heritage is a commodity and that as such, it is a tool - or factor - of production. Here, Piero Sraffa, an Italian economist who taught at Trinity College and at Cambridge University provides an important contribution to the estimation of the value of a commodity such as heritage. In his major work²¹ Sraffa writes on Fixed Capital, being a durable production tool, entering annually into a production process in the same way as, say, the raw materials which are regularly consumed in the production. In this perspective, a heritage site or a cultural monument will be considered as being (a) a fixed capital and, (b) a commodity which contributes to a production process. For the sake of this presentation, the text of Sraffa will be used as a guide and either the site or the monument shall be referred to as “heritage”.

Heritage therefore is a durable production instrument which is part of the means entering yearly in a production process like any other means of production consumed in the process. At the end of the period (say, a year),

²⁰ Joan Robinson provides us with an interesting reading of this concept in her book « The Accumulation of Capital » (Macmillan St Martin's Press, London 1956) on page 393 in a section entitled « Income from Property as the Reward of Waiting ».

²¹ Piero Sraffa, “The Production of Commodities by Means of Commodities – Prelude to a Critique of Economic Theory”, Cambridge University Press, 1960.

what remains of the heritage used in the process will be dealt with as a portion of the joint annual product of the branch, the main output of which being the negotiable commodity which represents the main subject of the process. In our field of economics of heritage and to simplify the explanation, we can suppose that the subject of the production branch is the returns from tourism.

Let us consider for example a knitting machine which together with the thread, the energy etc. contributes to the production process. At the end of the production period under consideration - any given year, the machine has aged by one year; it has been utilised, it has become older by one year and it would then emerge at the end of the production period as a new commodity together with the socks it had produced. This implies that the same machine, at different ages, be treated as as many different products, each having its own price, its own value.

Consequently, a branch which uses a durable production instrument must be looked at as being subdivided in as many separate processes as there are years in the total life of the instrument. Every one of these processes uses an instrument of a different age and every one produces, jointly with other commodities, an instrument that is older by one year than the previous one used in the process.

In the case of heritage, sites and monuments can be assimilated to such commodities as Sraffa defines in his process, replacing the knitting machine with a heritage site. Surely enough, it produces goods, generates revenues, together with other commodities used in the process: hotels, restaurants, buildings, travel, etc.

In doing so however, exactly like the knitting machine, the site is confronted with depreciation. In economic terms, its market price will therefore change; but we do not need to sell to know its market value.

Here, we return to the notion of “option value”, but with an economic, market oriented bias. We can say that the value of a site or a monument is equivalent to the value of goods it produces.

The value of heritage is therefore equal to the sum of all the revenues its existence generates, minus the costs of its management and of the maintenance of its heritage values.

If V_t = value of site at year (t),

R_t = total revenues generated by the existence of the site (s) in year (t),

C_t = management and maintenance costs of site (s) in year (t),

Then

$$V_t = R_t - C_t$$

Where $R_t = R_{a,t} + \dots + R_{z,t}$

Being the sum of all the direct and indirect revenues induced by the presence and utilisation of the site, such as:

- entrance fees (tickets) and related costs,
- sales of maps, guides, souvenirs, etc.
- restoration, parkings, ...
- hotels and recreational activities,
- transportation to and from the site,

Taking into consideration the fact that every one of these activities induces a variety of related economic activities in the national context.

And where

$$C_t = C_{a,t} + \dots + C_{z,t}$$

Costs ranging from the cleaning of the site, its presentation, scientific research and publications, and depending of the fragility of the site, the

direct and indirect costs of its physical maintenance and continuous rehabilitation to match the degradation caused by its utilisation.

Theoretically, if we assume that a tool such as a heritage site produces revenues with a constant, regular efficiency throughout its existence, the annual cost of its maintenance and management to cover its depreciation must be constant if we want the prices of all the units (different types of revenues) produced by this tool (heritage) to remain equal through time. This annual cost will be equal to a fixed annuity, the value of which - calculated on the basis of the general rate of return (r) - is equal to the original price of the tool ²² (or economic value of heritage). If this direct economic value is $V_{(0)}$ and the life of the site (n) - which in the case of a physical cultural heritage should be as long as possible²³, the annuity will become :

$$V_{(0)} \times [r(1+r)^n]/[(1+r)^n - 1]$$

However, we had considered that the annual processes of production differ one from the other by the sheer fact that the production tool (heritage), produces at the end of every process a new tool, a new commodity, older by one year from the previous one. Its value therefore varies with its age - or better, with the number of years of its use. Therefore, year after year, more of the returns of heritage should be devoted to its protection and presentation.

Thus, if

V_{t_0} = direct use value of the site in year t_0 ,

V_{t_1} = direct use value of the site in year t_1 ,

dV_{t_1,t_0} = variation of the direct use value between t_1 and t_0
(which can be negative),

and,

²² In the case of heritage, this price can be the market value of a piece of art, or the social value of a site or monument, this being estimated through, for example, the contingency valuation method or even the market value of the monument which would represent the pure economic direct value, excluding any patrimonial value.

²³ But for our case here, we should rather say that the life of the site is the expected number of years of its exploitation.

TR_{t_0} = total direct use revenues in year t_0

TR_{t_1} = total direct use revenues in year t_1

TC_{t_0} = total maintenance and presentation costs in year t_0

TC_{t_1} = total maintenance and presentation costs in year t_1

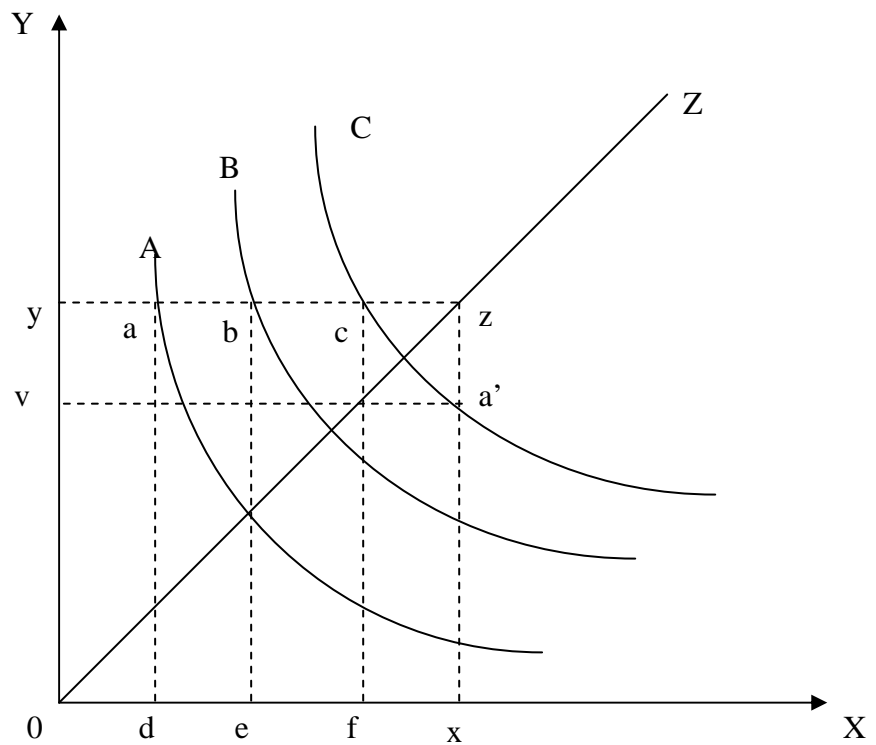
Then,

dV_{t_1,t_0} should be equal or higher than $[(TR_{t_1} - TR_{t_0}) - (TC_{t_1} - TC_{t_0})]$ if the site is to retain its values.

This relationship however depends also on the type of the site and on the amount of direct use it can absorb (among other uses, visits). A fragile site like, for example, a prehistoric or a Phoenician archaeological site, cannot receive the same numbers of visitors and accommodate the same types of uses than a roman amphitheatre or a historic building. Similarly, historic cities - as it is well known - cannot accommodate too many tourists if they are not to become mono-economies.

These relations can be best explained in a diagramme. In the following diagramme, the vertical axis (OY) represents the revenues generated by the use of heritage and the horizontal axis (OX) the life of this heritage. The (OZ) diagonal represents the fragility of the heritage considered - fragility increases closer to (O). The isoquant curves A, B and C represent the relationship between revenue and duration of heritage of different fragility.

For a given level of revenue (Oy), the less fragile heritage (curve C) will have a life duration of (Of) and the most fragile a life duration of (Od). For a revenue of (Ov), lower than (Oy), the life duration will increase to reach (Ox) for the less fragile.



As can be seen, the higher the return, that is the more heritage is exploited, the shorter its lifetime. Through increased management (protection, conservation, restoration, adapted use,...), one can hope that, at equal rate of return, its life can be made longer.

On the diagram above and for a given level of expected return (y), the life duration of heritage would increase from (a) to (b) and maybe to (c) through increased investments, improved management, a better use. The economic limit of such an exercise is when the management costs become equal to or exceed the direct income generated by the site.

There are other limitations however and more important than the economic ones. The intangible values, as we shall see, suffer from any type of use of a heritage site. Their value is almost impossible to calculate and their loss is invaluable.

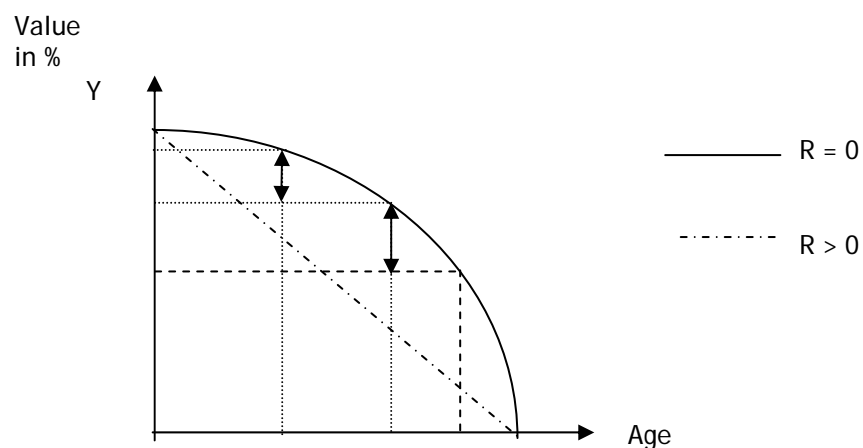
c) The Amortization (???) of Heritage

If a site is not used, i.e. when its return is nil, then its amortization remains equal to its normal routine maintenance. However, when this return becomes positive ($r > 0$) because the site is used, things change.

Under normal circumstances, the annual amortization will vary according to the needs of the site, generated by its use, its obsolescence - rather its degradation. Since it is difficult to anticipate the budgetary needs for the maintenance of a site on a yearly basis (a site is not a tool), it becomes necessary to plan ahead of time an arbitrary amount based on our forecasts of the site utilization and returns.

Because heritage is entering more and more in competition with other sectors of the economy (such as public services) for the allocation of financial resources, its market value, its economic role and the estimation of its returns can help to secure the funds needed.

Economic theory shows us that the market value does not decrease equally each year. To the contrary, when a commodity begins to generate revenues, its value decreases in a progressive manner. This is better shown in the following graph.



In this graph, the percentage of the value of the site is represented by the (OY) axis: it begins at 0% at (0) to end at 100% at (Y), where the curves representing amortization (R=0 and R>0) meet the (OY) axis. The theoretical age length of a site - which must be maximal, is represented on the axis (OX), its theoretical limit being the point of junction of the curves with this axis.

The diagonal (dotted) represents the theoretical evolution of the value of heritage when not in use. It loses value normally by simple natural wear. The curve is a simplified representation of the evolution of the value of a site being used regularly: its value decreases more each year. A higher return of the site use will increase the gradient of the curve and will eventually reduce the life of the site. In other words,

$$dv_{(n,n-1)} > dv_{(n-1,n-2)}$$

where (dv) is the variation of the market value of a site and (n), (n-x) represent periods of use and (x) being equal to as many periods of use as considered

This curve is a simplified representation of the evolution of the value of a site under use. Its value decreases more year after year : the higher the return of the exploitation of the site, the faster its loss of value and the steeper the curve. One must also note that in a pure economic perspective, the market value of heritage should increase with its return, with the revenues its use generates. This is rather contradictory since we have just seen that the value of heritage decreases with its use. This paradox is due to the difference between market or use value and intrinsic value of heritage. While the first, the use value, increases with the economic returns of heritage, the second, the intrinsic values of heritage, diminish because of its exploitation, its wear.

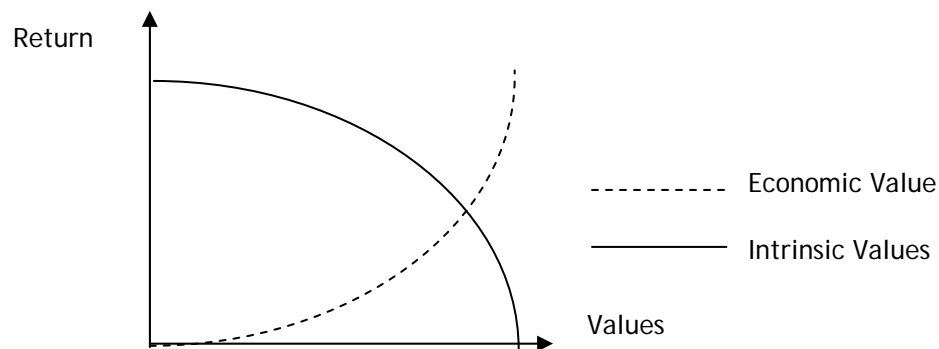
Piero Sraffa explains this paradox when he writes:

"Let us consider the position of a tool at a given age (t) with a total life duration of (n) years. The sum of the decreases of its value through (t) years will be smaller if r>0 than if r=0. Thus, the sum of the remaining

decreases until its value equals 0 and which is equal to its present value will be higher if $r > 0$ than if $r = 0$. Similarly, one can demonstrate that its value will be bigger if $r > 0$ and even that it will increase with every increase of (r) ."

For heritage, this means that in terms of economic utility, the market value - or use value - of a site is a direct function of the return of its use. For the economy, a site has value when it can be fully exploited, with a maximized return. This is where resides the paradox : there is a dilemma between the economic value of heritage and its intrinsic values, while its economic or market or use value relies on its intrinsic values : a site which has no intrinsic values (beauty, picturesque, aesthetics, history, monumentality, memory, scientific, etc.) will have no market value.

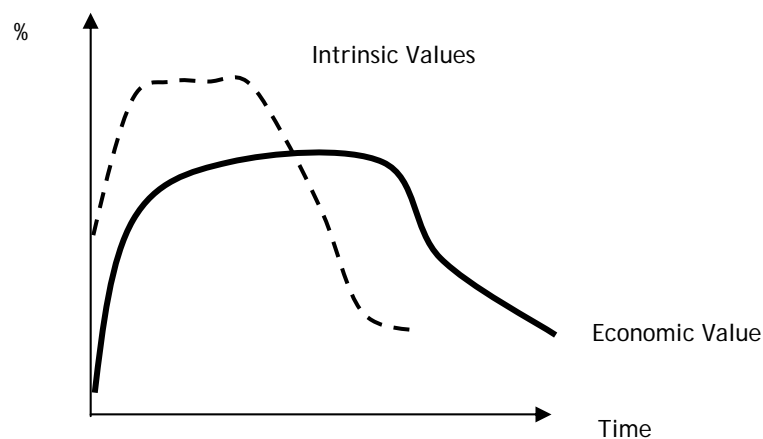
This is clearly a short-cut in the reflection, at least because we are not making a difference between an intrinsic value and another: a site can lose its scientific values but retain most of its picturesque. But irrespective of the type of intrinsic value, there is a direct relationship between use value and intrinsic values which can be represented as follows:



To resolve this conflictious relationship between the two values - the increase of one leading to decrease of the other, an equilibrium has to be sought. Heritage must not be destroyed and, at the same time, it must contribute to the economy. Therefore, the maximal economic utility of a site must not go above the point of junction of the two curves. But this is a very sketchy graph and never under real condition would the relationship between

these values be so linear. It varies - and hence the form of the curves - according to the nature of the site.

This is very theoretical since it is extremely rare to find such a linear and direct relationship between heritage values and economic values of a site. In practice, the relationship and hence the form of the curves is somehow different and would not be always negative. It is better represented by the following graph.



Following a subjective growth of the intrinsic values of a site caused by its increased visibility and accessibility, the continuation of its economic use will eventually bring progressively down its intrinsic values by the sheer consumption of the site.

The progressive decrease - the loss - of the intrinsic values of the site will produce a reduction of its economic (market) value, though this last will survive longer than the intrinsic values. The use of a monument such as an old palace can continue long after this palace has lost all of its historic values.

III - The Relationships between Heritage and Economy

A - The Role of the Market in the Offer and Supply of Heritage

We have shown the historic evolution of the concept of heritage and the role of heritage in the economy and of its contribution to the economic process. Before further developing this part, we shall now attempt to detail the economic reasons which push the demand for more heritage and how this heritage is used.

Tourism and employment opportunities in this sector have imposed on us an economic use of heritage through the market of heritage, which is similar to any other market of rare commodities: first and foremost, it is a market where the information on the availability and quality of the goods is determinant in its functioning.

More than the rarity of the heritage goods, it probably is the availability of information which sets the value of the sites and monuments. Together with the ease of access, with the availability, information sets the market value. Despite all its picturesque, aesthetic and historical values, Nemrud Dagh in Turkey has a lower market value than the Alhambra.

Françoise Choay²⁴ writes about the transition from the cult of the historic monument to the industry of the historic monument. She gives the following reasons for this transition:

- the globalization (*mondialisation*) of the western values and references which contributed to the oecumenical expansion of the heritage practices as symbolized by the World Heritage Convention of UNESCO since its adoption in 1972;
- the increasing discoveries of archaeology and the refinement of the memorial project of the human sciences which have determined the expansion of the chronological field in which historical monuments are

²⁴ Françoise Choay, « L'allégorie du patrimoine », Editions du Seuil, Paris 1992.

recorded. This joins up with the expansion of the typology of the historic heritage which - as per the expression of Françoise Choay - is caused by the Noah Complex which presses for the protection of all types of constructions;

- the great democratization project which includes the democratization of knowledge and the right to culture, inherited from the period of the "Lumières" has brought the development of the leisure society and of the so called cultural tourism. These have spread over the entire society the taste for heritage and for its protection

All these factors have together greatly contributed to the development of the tourist sector, of the demand for leisure and the quest of beauty, picturesque and exoticism, amply represented in other cultures and dead civilization physical remains. The quest for such monuments is the result of a desire for dreams and of the availability of an economic surplus (*Prosodoi* again) at the global and the individual levels. The tourist market has become the major consumer - and therefore a factor for the creation - of heritage.

Like any other rare commodity, heritage needs recognition and communication here is the key-word. It is the principal instrument of its marketization. At equal degrees of accessibility and of beauty (!) the site which is best displayed through communication will have the highest return and hence the highest market value and the highest role in the economy.

This is why the World Heritage Convention has become so attractive and so reputed. An inscription on the List can be an insurance of increased revenues generated by tourism and of increased employment opportunities.

Since 1978, the numbers of sites listed under this Convention has grown in a quasi-exponential manner, principally in the countries of the Northern hemisphere and more particularly in the major tourist destination countries: France, Italy and Spain (see Tables below).

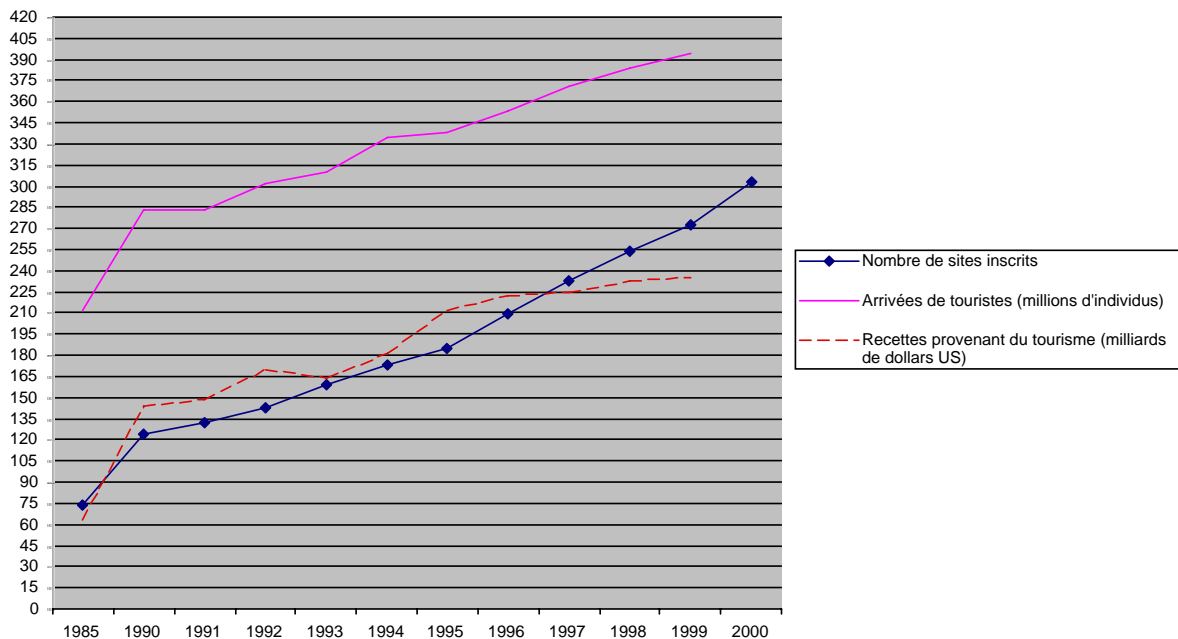
Listing of cultural and natural sites on the World Heritage List (1978 -2000)

Years	Africa	Arab States	Asia & Pacific	Europe, USA & Canada	Latin America & Carribean	Total
Total	53	52	135	352	98	690
Sub-total 1978-92	40	43	71	176	47	377
Sub-total 1992-2000	13	9	64	176	51	313

Comparison between the numbers of listed cultural sites, the numbers of tourists and the revenues from tourism in Europe (1985 - 2000)

Years	Inscribed Sites (cumulative)	Numbers of Tourists (millions)	Revenues from Tourism (billions of US\$)
1985	74	212	63,5
1990	124	282,7	143,5
1991	132	282,9	148,5
1992	143	302,3	169,1
1993	159	309,9	163,8
1994	173	334,7	181
1995	185	338,4	211,7
1996	209	353,7	222,2
1997	233	371,1	224,5
1998	254	383,8	232,5
1999	273	394,2	234,7
2000	303		

Evolution Europe 1985-1999



A simple direct calculation of correlation between these series show very positive results:

- between the cumulated numbers of listed sites and the flows of tourists (0,981)
- between the cumulated numbers of listed sites and the revenues from tourism (0,943).

B - A Comparison with the World of Arts

There is some similitude between the above and the market of paintings as studied by D. Galenson and B. Weinberg²⁵ in the United States. They show the impact of the market forces on the relationship between the age of the artists and the market value of their works. Studying the american modern paintings sold since 1980, they estimate the relationship between the age of the painters and the value of their works for two successive groups of

²⁵ David W. Galenson et Bruce A. Weinberg : «Age and the Quality of Work : The Case of Modern American Painters », National Bureau for Economic Research, Boston, 2000.

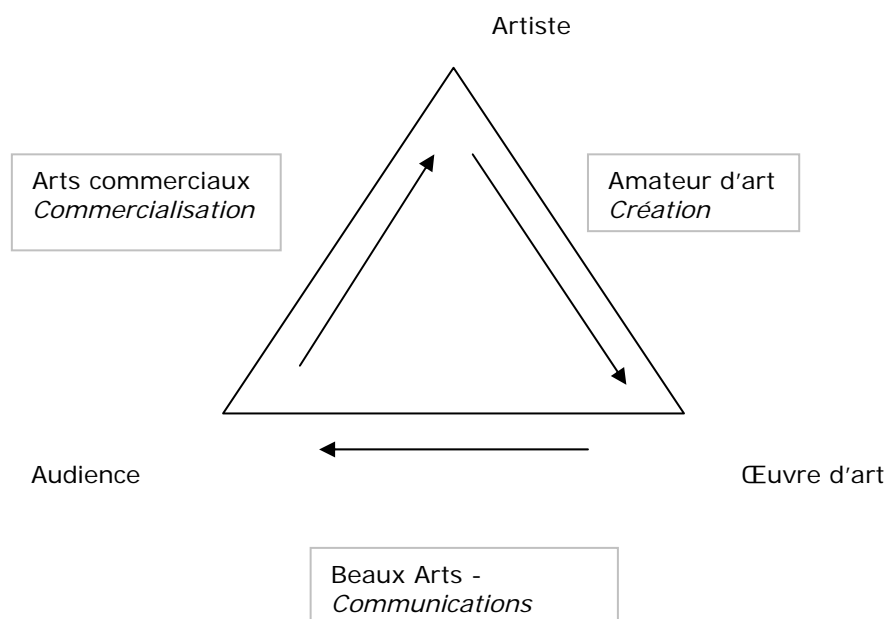
reputed modern artists which include most of the important US painters born in the 40 first years of the 20th Century.

The authors argue that a profound change happened in the early 50s bringing about a decline in the age at which the contemporary renowned painters have produced their best pieces of art. This has determined the two groups of artists considered : one constituted of those born between 1900 and 1920 and who have started their career before 1950 and the other of those born between 1921 and 1940 who begun painting after 1950.

If in the first group there were more painters and 10 out of the 15 painters of the group belong to the same type of expression, abstract expressionism, the second group is more heterogenous with painters belonging to the op-art, pop art, minimalism, conceptual art and other types.

The study demonstrates that these differences - the increase in the numbers of painters and of the diversity of styles - are the direct result of the growth of demand for american contemporary art, demand stimulated by the critics of art in the media which puts more pressure on the painters to always produce more and different types of paintings.

Diagramme of the Relationships between the Artist and the Market



The same applies to heritage which is created, built, then appreciated by a few - scientists and amateurs, travellers - who publicize it in their diaries or in their circles, photographs, scientific publications, creating thus an audience. The market agents transform it into a commodity and sell it.

C - Space and "Cultural Districts"

Determining and explaining the role of heritage in economy can be done through a variety of means. It is agreed that heritage plays a role as a commodity, that it contributes to the production of commodities, goods and services and therefore interacts with its economic environment. This economic role depends on the capacity of heritage to play it without losing its intrinsic values, capacity which varies with several factors : fragility of the site, political will to protect it, nature of the site or of the monument (a church will be used differently from an amphitheatre), desire to protect the specificity of historic quarters, etc.

Concurrently, there are places which are more patrimonial or which are more dependant on heritage than others : concentration of heritage sites or monuments, geographical proximity of related activities.

Walter Santagata, an economist from Turin University has worked on what he calls "Cultural Districts"²⁶. His reflection is built around Alfred Marshall's concerning the industrial concentrations, the conditions of these concentrations and the 'Central Place Theory' of the Thirties - for every product or service, there a minimal market : the smaller the market, the smaller the product. For example, a small town will have a small museum.

Though this approach provides an explanation to the concentration of artists, of galleries and of museums in large and wealthy cities, the new World economy and the developments in communication and in travel have transformed the art and heritage markets.

²⁶ Walter Santagata, "Cultural Districts for Sustainable Economic Growth"; a paper presented at the 11th Conference of the Association for Cultural Economics International, Minneapolis (U.S.A.), May 2000.

Considered in this perspective, a cultural district is a space which is not necessarily defined geographically. Its economy is dominated and led by one or more economic agents working together, exchanging flows and producing goods and services having to do with the cultural sphere. The economic agents in a heritage city centre for example will take advantage of this heritage to build economic activities which will be related to heritage and to tourism (from restoration of buildings and of art objects to hotels and restaurants). These activities can be located in or around the site considered though it is not always necessary as would be the case of a farmer marketing his production under the name of the heritage next by and selling it, among others, to the restaurants of the site. Hence, 'cultural districts' seem to be more a matter of common economic space rather than of geographical unity.

Thus, the proximity or the localisation of its cultural production are not a prerequisite for the presence and development of a 'cultural district'. Rather it is that of the presence of several small-scale cultural firms which function together in an interactive manner. When the major part of the human and financial resources of these firms is of local origin, then the 'cultural district' can become a mode or process of development.

Similarly and because of the development of communication, the definition of the cultural sector is not any longer of a geographic, spatial nature. A sector of cultural activities can stretch its connections to far away industries and economic activities. What is important in our views is rather the capacity of heritage to stimulate the economy.

Then, the economic use of heritage requires for its understanding a well defined geographical space together with functional spaces defined by the interrelations existing between the heritage and the economy and between firms influenced by heritage. We can think of concentric circles representing areas which, when we move from the centre to the outside, represent areas less and less influenced by the presence of heritage. In these circles certain firms will be more related to heritage than others.

Distance to heritage thus is not a determining factor in our times. It is more the functional relation between heritage and the other firm - industry, defined through the flows of exchange that will determine the spatial role of heritage. The traffic of an airport at say 50 or 100 km from an important site will be more influenced by the presence of the site than will be the steel factory located at only 5 km. From the site. It is the type of industries that will contribute to the making of heritage a pole of growth.

Again, there can be heritage sites surrounded by underemployment while new cities will be thriving and attracting labour. It all resides in the way the heritage is integrated or not in the local economy which surrounds it : it depends on the utilization by heritage of the neighbouring resources for its functioning.

A commodity which contributes to a production process, heritage enters into interaction with several sectors of the economy. The more these interactions take place with the local or regional economy, the more heritage will play a role in the economic betterment of its surroundings. There are however limits to this interaction : on the one hand, the local or regional economy must have the ability to serve, to provide heritage with its needs, on the other, the impact of heritage on the local or regional economy must not transform this economy into a mono-economy where heritage related activities replace the others, destroying thus the required diversity for development.

D - Heritage : a propulsive or a dependant firm

As we have seen, equilibrium is the key word : equilibrium between the dominant units, the complex or macro-units, the development poles, the propulsive firms, local economy and the market. A harmonious integration of heritage in the economic process requires a global view²⁷. To reach this stage, as Fr. Perroux writes, we must start from a new reading of the Walrasio-Paretian theory of inter-dependence among agents, based on an expression of the links between prices and quantities and, therefore between agents based

²⁷ See more particulalry : Perroux, Fr., "L'économie du XXe siècle", PUF, Paris 1969.

on a more modern reading of the relationships, taking into account the power games between groups : in our case, travel agents, hotel chains, transport companies, associations of traders, etc. and the local economy agents.

It is not necessary here to enter in a detailed presentation of François Perroux analysis of the development poles and of the propulsive firms. We shall rapidly deal with the role of the components of an economic space in which we shall consider heritage as an agent of the local or regional economic activity.

Firstly, we must accept that the action of agents on the economic reality takes place more through groups with common interests rather than through isolated agents. In the case of heritage, we shall deal with the group of specialized agents such as travel agents, transport companies etc.

The ability of a group to influence the economy, to transform it, to act as a leader depends very much on its relative position vis-à-vis the others in the production process and in the flows of exchange. On the other hand, the ability of the groups working in the field of heritage or in a related one, depends on the presence, proximity and size of the heritage as well as on the possibilities of use or reuse of this heritage²⁸.

The indispensable presence of heritage alone is not sufficient to influence the surrounding economy. It requires firstly an economy able to absorb and use heritage : it has to be structured, offering complementarity and a variety of trades. Secondly, it needs to be strong enough not to become completely perverted by heritage, as said before while heritage needs to be protected in its use or reuse.

E - The Matrix of Flows and the Input-Output Ratios

The integration of heritage in the economy depends therefore very much on its size, importance, exceptionality, beauty, etc. To maximize this integration while protecting the intrinsic values of heritage, we must return

²⁸ Refer here to the diagramme of I. Serageldin.

to the relationship between rate of return from heritage and the protection of heritage, its physical presence and its intrinsic values.

As for economic analysis, be it a matter of planning and forecasting or of understanding the present or the past, it will use a matrix model of the flows of exchange. This matrix will be as refined as are the data collected. To begin this matrix, we need to properly define the areas to be considered in the study : what are the trades, the agents, the sectors entering into an exchange with heritage, into the composition of its economic role ? What is the spatial area in which this matrix will be analysed ?

This matrix will then represent these exchanges either in real terms or in percentages of the total flows. The latter will give a clearer picture of the weight of heritage in the considered economy. Starting from this matrix, it becomes easy to simulate and relate these simulations to the study of 'input-output ratios' in the production process at which heritage participates. This will enable us to evaluate its role and weight in a given economic framework as well as to evaluate the return on investments in heritage, taking into consideration the mode of production and the terms of trade between heritage and its environment.

Through these analyses, we can determine the direct and indirect impacts of the use of heritage : to simplify, we shall say that the direct impacts are those generated within the site through its direct use (visits), while the indirect ones are those generated by indirect use, i.e. non destructive uses of heritage. The following matrix is a simplified representation of the flows between heritage and the economy.

Input-Output Relations - An Example

Inputs		Outputs							
		A				B			C
		Agriculture	Industry	Heritage	Services	Consumption	Gross Investments	Total	Total Production
A	Agriculture	0	30	5	0	55	10	65	100
	Industry	20	0	15	20	30	15	45	100
	Heritage	10	10	0	25	45	10	55	100
	Services	20	20	30	0	20	10	30	100
B	Added value	50	40	50	55			195	
C	Total Production	100	100	100	100				

For each sector, including heritage, this matrix presents all the interactions, the production by sector, the purchases from the other sectors and its share in the added value and in the total production.

Before concluding, we must not forget the existence of an evident relationship between direct and indirect impact : a direct use stimulates the indirect one. However, here again there are clear limits : excessive direct use leads to overexploitation which in turn will decrease the attractive power of heritage. The indirect impact will continue to grow for a while before beginning to decrease as well.