



PROGRESS STATE FOR SINGLE ACTION UNTIL THE 30TH OF NOVEMBERE 2018

Find below a brief description of the activities carried out.

A 1 - Administrative procedures for the project start - CONCLUDED

The administrative procedures have been concluded in December 2017 after that Ticino Park formalized the partnership agreements on 09/11/2016 with GRAIA and on 17/11/2016 with FLA. On 20/10/2016 a convention has been signed with CARIPO Foundation, which participates at the project as co-financer. Each beneficiary identified its own project organization chart and formalized to its employees their role in project Actions.

On 06/09/2017 Ticino Park appointed the Project Manager.

A 2 - Territorial analysis, consultation and agreements with local farmers - CONCLUDED

This activity has been concluded in December 2017 and is strictly linked to Actions C4 and E2.5, the Park and FLA identified the farmers that will be involved in Action C4 and will implement the winter management of "marcite".

On 4/07/2017 in Vigevano (Pavia) a first meeting was organized with farmers, a second one on 5/07/2017 in Magenta (Milano) was held. Furthermore, several meetings with farms, Consortium and Municipalities were held. 12 agreements with local farmers were signed.

A 3 - Proposal for establishing a new SAC for the protection of "Adriatic Sturgeon spawning sites" – IN PROGRESS

The action was launched regularly in January 2017 with the draw up the technical documents necessary to advance the request for the designation of the new SAC.

The documents collected until today consist in:

- results of fishing monitoring realized during the last 20 years;
- thematic digital cartography;
- reliable reports about the presence of the sturgeon in the area;
- any documentation available to prove the presence of the sturgeon;
- a general description of the site;
- the importance of the site in the Natura 2000 network;
- essential regulatory references for *Acipenser naccarii*;
- target conservation species.

All data regarding the environmental and faunal characterization are organized in a geodatabase that will be implemented with the activity progress.

The SAC designation request has been submitted with the Natura 2000 standard form. The evaluation from Lombardy Region is in progress.

Campaigns for the containment of *Silurus glanis* were carried out in order to allow long term conservation of *Acipenser naccarii*.



A 4 - Planning of the creation and restoration of wetlands, wet forests and other aquatic habitats – CONCLUDED

GRAIA has drafted and delivered to the Ticino Park the definitive project relating to the interventions in actions C1, C2, C3, C5 and C6. The process ended positively on May 2018 and the executive project was approved.

A 5 - Consultations for the creation of a task force to protect *Acipenser naccarii* spawning site - CONCLUDED

In January 2017 the activity begun with the training of the volunteers. During the first lesson the project Life Ticino Biosource has been introduced with particular regarding ichthyological aspects.

Sensibilization and involvement of citizens has been carried out through public meetings during January, February, March and April 2017 where project organization, partner, financing, UE role, target of the project, project area and interventions site, project objectives, interested Park environment, Life-Natura project structure, actions of the project, description of some habitat requalification actions and species protection, importance of monitoring actions has been treated. The action concluded with the signing of an agreement with Pavia-FIPDAS ASD section.

In June 2017 with an act has been formalized the establishment of the task force for the defence of the reproductive sites of *Acipenser naccarii*.

C 1 – Creation and restoration of wetlands and other aquatic habitats at “I Geraci”, in favour of birds and butterflies of conservation interest

C2 –

C3 –

C6 -

- IN PROGRESS

For the realization of action C1 interventions were carried out two tenders, as approved projects.

The first, which concerns the reforestation and forest improvement work in the Motta Visconti town, was assigned in January 2018. In February 2018 the construction site was opened and the works took place in the following months.

The crop care continued throughout the summer and early autumn with the construction of 3 hectares of wetland forests classified as habitats 91E0* “Alluvial forests with *Alnus glutinosa* and *Fraxinus excelsior*” and the forest improvement of about 12 hectares of forest, through these interventions: elimination of alien species (in particular red oak and conch pine) in woods classified as habitats 91F0 “Riparian mixed forests of *Quercus robur*, *Ulmus laevis* and *Ulmus minor*, *Fraxinus excelsior* or *Fraxinus angustifolia*”, for about 10.5 ha and retraining of the Robinia woods for about 1.5 hectares, with the aim of extending the 91F0 habitat in the future.



The second tender concerns all the other interventions related to the C1 action and the works of the Actions C2, C3 and C6. The works were entrusted November 2018 while the start will be in December 2018.

The supply of herbaceous species for the Action C1 and C6 was won by a specialized company.

C 4 - Management of lowland wet meadows in favour of birds and butterflies of conservation interest – IN PROGRESS

The action begun in January 2017 aim to manage lowland in favour to species of conservation interest. The Ticino Park is the responsible in collaboration with FLA, which care of scientific contents. In November 2017 11 companies has been selected with an overall area of 61 ha of abandoned “marcite”. Each “marcita” is regularly monitored. The flooding for years 2018-2019 will continue starting from November.

For the realization of the autumn lowland has been identified 6 companies with a surface of 13 ha. The monitoring of the activities is in progress.

C 5 - Restoration and creation of forest habitats of conservation interest at Bernate Ticino – IN PROGRESS

For the realization of action C5 interventions the works were entrusted to a company in November 2018 through public tender.

C 7 - Active defense of *A. naccarii* spawning sites – IN PROGRESS

The action, started in April 2017, continued by working on the defence of the river stretch where Cobice sturgeon reproduces, through a voluntary surveillance activity carried out by the Task force and the containment of *Silurus glanis*, through campaigns of electro-fishing carried out in strategic points.

In the period June 2017-August 2018 additional 115 patrols were made, with a frequency of 8 rounds per month, almost 2 per week. All the patrols have been recorded, noting observations and any criticalities detected.

Among the most important aspects emerged thanks to this activity has been noted:

- 4 random catches of adult sturgeons (promptly released) made by fishermen in the patrolled area;
- the recovery of a dead young sturgeon of the year that could be born from natural reproduction.

The results of the patrols also offer updated information on the state of the environment and the presence of other animals.

In the same period (June 2017-August 2018) the campaigns of containment of *Silurus glanis* were still carried on by the volunteers and GRAIA. A total of 12 containment campaigns have been performed.

C 8 - Reintroduction of *Huso huso* in Ticino River

The action aim to reintroduce *Huso huso* in Ticino river and has 2 phases:

1. Preparatory phase of research of potential suppliers of stocks
2. Reintroduction phase

In the second year the action has been implemented on many fronts:

- breeding of the stock of 60 specimens of 5-6 years of age, already housed in the semi-natural farming canals at Cassolnovo.
- acquisition (with Life funds) and breeding of 80 specimens (age 0+)
- trials of weaning of a new stock of 100 juveniles (age 0+), purchased by Ticino Park with own funds;



- more detailed genetic studies on the purchased stocks of animals

D 1 - Monitoring the efficacy of actions C1 (faunistic aspects) and C6 – IN PROGRESS

The monitoring affects fauna species (avifauna and *Lycaena dispar*) present in the intervention area of Action C1 and C6. The activity started in January 1st 2017 and it is regularly in progress in both intervention sites.

Avifauna Monitoring

Locality “I Geraci”, in Motta Visconti Municipality (Action C1) - SIC IT2080002 “Basso corso e sponde del Ticino” - ZPS IT2080301 “Boschi del Ticino”.

From June 1st 2017 to September 30th 2018 has been monitored, with 15 days of frequency, with a total of n° 76 fields excursion. The monitoring has been done either in the intervention area and in the perimetrical ones in order to realize a frame of the avifauna occurrence. In total has been detected 16 species of common interest, where 6 are target species. Furthermore, more 21 species of common interest have been detected at European scale classified as SPEC – Species of European Conservation Concern (BirdLife International 2017), 3 of them has been classified with the maximum priority (SPEC 1).

Locality “La Piarda”, in Bernate Ticino Municipality (Action C6) - SIC IT2010014 Turbigaccio, Boschi di Castelletto e Lanca di Bernate - ZPS IT2080301 “Boschi del Ticino”

From June 1st 2017 to September 30th 2018, has been done the monitoring with 15 days of frequency, with a total of n° 32 of field excursion.

In total has been detected 14 species of common interest, where 6 are target species. Furthermore, more 16 species of common interest have been detected at European scale classified as SPEC – Species of European Conservation Concern (BirdLife International 2017), 4 of them has been classified with the maximum priority (SPEC 1).

Monitoring of *Lycaena dispar*

Locality “I Geraci” – Motta Visconti (Action C1)

The monitoring of *Lycaena dispar* has been done in 5 area within the Geraci sites, through transect (buffer 2,5 m R and L + 5 m h) with frequency of 15 days, from May to October 2017 and from March to October 2018, with a total of 30 excursion fields.

L. dispar has been observed either in 2017 and 2018. It is confirmed the presence larval food plants for *L. dispar* (different species of *Rumex spp.*) in all identified area with the exclusion of one station. Until today, Monitoring of *Lycaena dispar* in Bernate Ticino locality of “La Piarda” (Action C.6)

The monitoring of *Lycaena dispar* has been done in 3 stations, through the execution of transect (buffer 2,5 m R and L + 5 m h), with frequency of 15 days, from May to October 2017 and from March to October 2018, with a total of 22 excursion fields.

For what it may concern the target species, in 2017 has not been collected signals, while in 2018 the species has been signed in transect La Piarda “AUTOSTRADA”.

D 2 - Monitoring the efficacy of action C2 – IN PROGRESS

The monitoring interest avifauna species present in the intervention area of C2 Action. The activity started in January 1st 2017 and is regularly in progress. During the referring period 1/06/2017 – 30/09/2018 has been done the monitoring with a frequency of 15 days, realized through n° 69 excursion fields. The monitoring interested 2 area of intervention and other 8 area where no intervention was planned, in order to realize an overview of the avifauna present in the Torrente Arno’s basin ecosystem.



In total has been detected intervention area and no intervention area, 24 species of common interest, where 9 are target species of the LIFE project. Furthermore, more 30 species of common interest have been detected at European scale classified as SPEC – Species of European Conservation Concern (BirdLife International 2017), 6 of them has been classified with the maximum priority (SPEC 1).

D 3 - Monitoring the efficacy of action C3 – IN PROGRESS

In this second year of monitoring we proceeded to carry out the *ante-operam* monitoring of the amphibians in the project sites for Action C3. The monitoring, carried out on two occasions in March 2018 and April 2018, showed the following presences:

1. Maresco di Villa Reale: presence of active reproduction of red frog (probably *Rana dalmatina*, for the characteristics of the egg clusters). Also, green frog is present, of which were found a young specimen and at least 3 adult specimens;

2. Ramo Delizia, Ramo Morto, Canale Gravelone: no trace or presence of amphibians have been detected in both campaigns carried out.

The *ante-operam* framework is now concluded. In the third year the post-operam monitoring campaign will be launched. There is no particular difficulty in performing the action.

The target species are: *Lethenteron zanandreaei*, *Cottus gobio*, *Sabanejewia larvata*, *Rana latastei*, *Rana dalmatina*, *Hyla arborea*.

D 4 - Monitoring the efficacy of action C4 – IN PROGRESS

The monitoring activity has regularly begun in January 2017.

Monitoring of the avifauna

During the referring period 01/06/2017 – 30/09/2018, has been done the monitoring with a frequency of 15 days, with a total of n° 32 monitoring for each area, realized through n° 83 excursion fields.

The monitoring has been concerned until December 2017:

- a. Not managed “marcite”, which potentially could be involved in the winter flooding foresaw by Action C.4 of the LIFE project;
- b. Managed “marcite” with winter flooding, which potentially could be involved in the winter flooding foresaw by Action C.4 of the LIFE project;

From December 2017 until September 2018, “marcite” where the winter flooding was activated as foreseen by Action C.4.

Totally, in the “marcite” observed, in those area where Action C.4 has been activated (managing of the “marcite” and in the no intervention area, n° 19 species of common interest, where 8 are target species of the LIFE project. Furthermore, more 23 species of common interest have been detected at European scale classified as SPEC – Species of European Conservation Concern (BirdLife International 2017), 4 of them has been classified with the maximum priority (SPEC 1).



All data has been collected in GIS (WGS84, UTM32) with an attribute table organized with the following fields at least: species name, X coordinate, Y coordinate, data (dd/mm/yy), number (specific where possible otherwise estimated), notes.

Monitoring of *Lycaena dispar*

The monitoring of *Lycaena dispar* has been done in n° 6 area. The monitoring activity has been implemented through transect (buffer 2,5 m dx e sn + 5 m h), with a frequency of 15 days, from May to October 2017 and from March to October 2018 with a total of n° 44 of excursion fields.

Lycaena dispar has been observed at least once in all the “marcite” with the only exception of Bernate station. The main number of species has been observed in Portalupa (specifically n° 36 of total species in Portalupa South station).

It is highlighted that the target species, even if it has not been observed in all the identified area, results currently in small population.

D 5 - Monitoring the efficacy of action C1 (vegetational and floristic aspects) and C5 – IN PROGRESS

The monitoring will be done in the Motta Visconti and Bernate Ticino sites, where Actions C1 and C5 will be realized. The aim of this monitoring is to verify the success of realization and/or rehabilitation of habitats of community interest, 91F0 and 91E0*.

The monitoring activity correspond to the *ante operam* of the already mentioned forestry interventions in Bernate Ticino area and *post operam* in I Geraci area.

In I Geraci and Motta Visconti (ZSC IT2010014) sites have been realized: n°10 transects (G10-G10), N°5 surveys in woods to be rehabilitate (Gb1-Gb5) and n°5 surveys in plantation of forest trees to be realized (Gi1-Gi5).

In the Bernate Ticino site (ZSC IT2080002) have been realized: n° 10 transects (B01-B10); n° 5 surveyed in private gardens to be requalified (Bg1-Bg5) and n. 5 surveys in woods to be requalified (Bb1-Bb5).

The floristic transects were located along the transit roads within the two monitoring areas. The purpose of these surveys is to detect the effects of the disturbance caused by the transition of the means that will be used in the works foreseen by the project and promptly detect the presence of any new species of exotic plants or indicators of conditions of estrangement from naturalness.

In the I Geraci site, the transects named G04, G06 and G07 were located along the access roads within artificial poplar groves. Following the execution of forestry planting interventions (2018), the road network has been slightly modified, also following a modest landslide (G06). These three transects were then relocated exactly along the access roads remained or roughly moved few meters in parallel.

The indicators utilized are: the complexity and organization of the territorial mosaic (present habitats and geospatial attributes); floristic and vegetational heritage (indicator species and type of vegetation); forest heritage (structure).

D 6 - Monitoring the efficacy of action C7 – IN PROGRESS

In 2018:

1. 8 monitoring campaigns of daytime electro-fishing carried out;
2. 4 nights observation campaigns by boat carried out.

In summary the results of the monitors reveal the presence in the tract of a fish community composed of at least 11 native species (including a single species of Community interest: *Barbus plebejus*).



With these campaigns it was possible to calibrate the direct observations and electro-fishing sampling methods in the river stretch. This will facilitate the comparison of the results with those of the successive monitoring campaigns, especially for the evaluation of the effectiveness of the *Silurus glanis* deterrence.

The fish fauna definition is improved even by the data (recorded and mapped) coming from the reports of sturgeons caught alive by anglers or found dead (action C7).

The action will be continued in the next two years, especially considering the activities not yet accomplished such as the behaviour analyses on the *Silurus glanis* and sturgeon.

D 7 - Monitoring the efficacy of action C8 – IN PROGRESS

In the second year the monitoring activity continued to assess the welfare status of the sturgeons farmed in the breeding canals of the Park. On the stock of animals already present at the basins of Cassolnovo (60 specimens 5 +), a control campaign was carried out in November 2017.

On May 2018 the biometric measures were taken and the microchips were inserted in all the 80 sturgeons 2 +, purchased under the C7 action a few days before.

It is expected that on December 2018 or at the latest on January 2019 the 60 larger sturgeons present in the Cassolnovo basins will be marked also with an ultrasonic transmitter.

D 8 - Evaluation of the socio-economic impact of conservation actions – IN PROGRESS

In this second year of activity more than 100 questionnaires were collected between different groups of stakeholders, including the students of a course on butterflies organized within the project. Moreover, the participants in events of dissemination organized by the Parco del Ticino or by other territorial authorities of the area were involved in this activity by filling the questionnaire.

It was also prepared to be distributed to the children participating to the E1 didactic activity, which will start in the schools in the third year. The boys will also be given a copy of questionnaire for their parent, to be returned.

It is being developed an online version of the questionnaire that will be posted on the Project's Facebook page before the end of 2018.

E 1 - Dissemination and awareness raising activities – IN PROGRESS

The project **web site** is at the following link www.lifeticinobiosource.it since June 2017. From January 2018 the website has been updated directly by the Project Manager, which implemented communication activities by opening on social media (Facebook) a page about the project, quite popular, where the updates on the project are reported.

The shooting of the **documentary** is in progress, operation fields already started in spring 2018. Project and script presented by the tender's winner aim to realize a documentary focused on a simple storytelling able to twist in different stories leading to different characters, all linked one to another by one project connection.

Newsletter: not foreseen by the Project. The Steering Committee believes to realize, with 3 months frequency, a newsletter where Project Progress are reported. Until today 5 newsletters have been published.

Butterfly course



During the workshop held in March the 10th 2018, has been activated 15 new volunteers, many trained during the identification course of 2017 which offered their free availability in conducting the census in at least 1 survey unit (su) with a total of 20 su (33 in total foreseen by the project).

The training course on observation and identification of butterfly has obtained a great participation (52 sign up) and a satisfying average number of attendances. The course structure, included the number of lessons (12) and field excursion/workshop (2), were the same of 2017. Headquarter of the course has been the Centro Parco “ex Dogana austroungarica di Tornavento” in Varese province. The interest, the participation and the preparation of the participants appear good for 2019 field season.

The number of participants has registered an increase of 7% than the previous year, since the number raised from 45 to 52. The number of active volunteers is significant, with an increase of 50% (from 5 to 15). The activation of volunteer’s observers (in a significant number) conveniently prepared must be considered as an important achievement.

First results regarding **environmental education** are beyond the foreseen: 40 classes were foreseen while 232 are effective, with 25 schools and more of 5400 participating kids.

The project booklet, a tool in support of educational activity, has already been designed, realized and distributed in 2/3 schools. The high number of school and kids has implicated the depletion of the booklet which should be printed again for those schools without it.

E 2 - Know-how and information transfer and exchange – IN PROGRESS

The LIFE project foreseen a contact’s network between Ticino Park and FLA and GRAIA partners with other bodies managing same project in European Countries, in order to enhance a reciprocal exchange of information on conservation and management of target species and habitats.

In October the 16th to the 19th 2017, employers of the Ticino Park, Michele Bove and Cristina Poma, participate to a knowledge and experience exchange with responsible of LIVEDRAVA project, on habitat and riparian birds of Drava river.

From 12/06/2018 to 15/06/2018 Dr. Fulvio Caronni, responsible of Woods and Vegetation Sector, went to Arnhem – NL to visit some natural managed reserves. The aim of the visit was to learn, thanks to the experts of RSPB, management techniques, recover and maintaining of wet zones and forestry environment to enhance biodiversity, which will be used in LIFE project (Action C.1. and C.6.).

Moreover, the LIFE project has been exposed the 18/10/2018 by Fulvio Caronni in Milan at “Role and Future for new woods and green system of plain and valley floor: an open debate between the Netherlands and Italy” meeting, another presentation has been done during the IV Italian Conference on river requalification kept in Bologna from 22nd till the 26th of October 2018.

Realized an introductory seminar on the 17th of January, with a presence of circa 50 people included farmers, agronomists, technicians of public body, interested citizens; realized also 3 excursions field (from January until June) in Abbiategrasso and Vigevano to learn the management of “marcite” and manual skill of shovel, as well as innovative technique to harvest and conserve fodder that must be ensiled (circa 90 of presences).



Con il contributo dello strumento finanziario
LIFE della Comunità Europea



A video of the course has been completed and is already been disseminated and booked for many public expositions (Cuggiono – MI Essere terra 23rd September, Green Week in Milan 27th – 30th September, Cameri – NO Biodiversità in tavola 13rd – 30th October, Inverno – MI Festa di San Martino 9th – 12th November).

F 1 - Technical and financial project management – IN PROGRESS

The activity begun in November 2017 and foreseen the assignment to an external assistance centre as PM and entrusted also the task of financial management.

The project coordinator summoned through the PM project partner in informative and update meeting.

F 2 - Monitoring of the project progress – IN PROGRESS

The action begun in October 2017 and foreseen the collection and organization of data to build the conservation action state of art finalized to monitoring the progress of the project. This is done through an indicator system foreseen by LIFE and each action. Results will be shown to the whole work group which can suggest any corrective measures.