TABLE OF CONTENTS

I. DATA ON PROPOSER....3
I.1. Name....3
I.2. Identification Number....3
I.3. Seat....3
I.4. Contact Data of the Proposer's Authorised Representative....3
I.5. Contact Data of the Person Authorised to Provide Relevant Information on the Proposed Works and Place of Consultations:....3
II. NAME OF THE CHANGE TO THE PROPOSED WORKS....3
III. DATA OF CHANGE TO THE PROPOSED WORKS....3
III.1 Location of the Proposed Works....3
III.2 Description of the Technical and Technological Solution....4
III.3 Connection with other planned and performed activities in the territory concerned....12
III.4 Type of Requested Permit for the Proposed Activities under Special Regulations....12
III.5 Statement on Anticipated Cross-Border Impacts of the Change to the Proposed Works....12
III.6 Basic information about the current status of the environment of the territory concerned....12
III.7 Residents....19
III.8 Services and Tourism....19
III.9 Archaeological sites....20
III.10 Land-use planning documentation....20
IV. IMPACT ON THE ENVIRONMENT AND HUMAN HEALTH INCLUDING CUMULATIVE AND SYNERGISTIC....22
IV.1 Changes in location of highway D4....22
IV.2 Changes in the interchanges....23
IV.3 Relocation and reconstruction of the road....25
IV.4 Structures of relocations and reconstructions of roads proposed in LUPD not specified in Assessment Report (EIA).....26
IV.5 Changes to bridge structures....27
IV.6 Changes in structures of relocations and adjustments of watercourses....30
IV.7 Changes to the relocations of utilities....31
IV.8 Changes in the noise control measures....33
V. GENERAL FINAL SUMMARY....33
V.1 Basic data on the proposer....33
V.2 Name of change to the proposed works....33
V.2 Location of change to the proposed works....33
V.4 Brief description of change to the proposed work....34
V.5 Data about direct and indirect impacts on the environment and human health including cumulative and synergistic....34
VI. Annexes....36
VII. Date of preparation....36
VIII. Name, address and signature of the author of the notice....37
IX. Signature of the author's authorised representative....38

NOTICE OF CHANGE TO THE PROPOSED WORKS

I. DATA ON PROPOSER

I.1. Name

Národná diaľničná spoločnosť, a.s. Bratislava

I.2. Identification Number

35 919 001

I.3. Seat

Mlynské nivy 45
821 09 Bratislava

I.4. Contact Data of the Proposer's Authorised Representative

Ing. Pavol Kováčik, PhD., MBA
Investment Director and Vice-Chairman of the Board of Directors,
Národná diaľničná spoločnosť , a.s., Mlynské Nivy 45, 821 09 Bratislava,
tel.:02/58311111

I.5. Contact Data of the Person Authorised to Provide Relevant Information on the Proposed Works and Place of Consultations:

Ing. Tomáš Pollák
Head of the Highway Investment Preparation Department,
Národná diaľničná spoločnosť , a.s., Mlynské Nivy 45, 821 09 Bratislava,
tel.:02/58311111, fax.: 02/58311706, e-mail: tomas.pollak@ndsas.sk

Ing. Ľubica Kušnierová
Národná diaľničná spoločnosť , a.s., Mlynské Nivy 45, 821 09 Bratislava,
tel.:02/58311111, fax.: 02/58311706, e-mail: lubica.kusnierova@ndsas.sk

II. NAME OF THE CHANGE TO THE PROPOSED WORKS

Highway D4 Bratislava Ivanka North - Rača

III. DATA OF CHANGE TO THE PROPOSED WORKS

III.1 Location of the Proposed Works

Region: Bratislava
Districts: Bratislava III, Senec, Pezinok
Cadastral territory: Ivanka pri Dunaji, Vajnory, Svätý Jur,
Type of structure: new structure
Object: section of highway D4 Bratislava Ivanka North - Rača represents the traffic connection of the existing highway routes D2 and D1.

Road category: D 33,5/120 a D 26,5/120

The structures will be constructed on the lands based on the layout plans in the cadastral territory of municipalities Ivanka pri Dunaji, Vajnory and Svätý Jur

III.2 Description of the Technical and Technological Solution

Assessment of a section of highway D4 Bratislava Ivanka North – Rača was carried out in assessment process concerning the structure Highway D4 Ivanka North – Záhorská Bystrica.

Description of the Environmental Impact Assessment Process
Impact Assessment Report for "Highway D4 Ivanka North – Záhorská Bystrica" was carried out based on the scope of assessment (18 July 2008 under No. 7155/08-3.4/ml) and Annex No. 11 to Act No. 24/2006 Coll. on Environmental Impact Assessment amending other acts. The Assessment Report was made by HBH projekt, spol. s.r.o. in December 2010.

The assessed section commences behind the Ivanka North interchange. All variants are designed to a maximum extent in line with the requirements specified in the scope of assessment (elevated and subgrade highway in the section around the Vajnory municipality).

- **Variant 2a** – elevated routing of highway in section around Vajnory municipality and between Marianka and Záhorská Bystrica municipality with length of 16.840 km.
- **Variant 2a** – subgrade routing of highway in section around Vajnory municipality and between Marianka and Záhorská Bystrica municipality with length of 16.840 km.
- **Variant 2a** – elevated routing of highway in section around Vajnory municipality and between Marianka and Záhorská Bystrica municipality with length of 16.722 km.
- **Variant 2a** – subgrade routing of highway in section around Vajnory municipality and between Marianka and Záhorská Bystrica municipality with length of 16.722 km.
- **Variant 7c** – elevated routing of highway around Vajnory municipality and subgrade routing of highway in section between Marianka and Záhorská Bystrica municipality with length of 16.722 km.
- **Variant SPL** – Senec- Pezinok – Lozorno

Based on the course of the entire process of the proposed works assessment (Technical Documentation, Plan, Assessment Report, Opinions, minutes of the public discussion, expert opinion) the Ministry of Environment SR recommends the following procedure during further preparation of the proposed works – assessed section of the highway to be divided into two parts in terms of project and construction:

- Ivanka North – Rača interchange
- Interchange Rača – Záhorská Bystrica (Karpaty tunnel)

Section Ivanka North – Rača Interchange

is recommended in the corridor of variant 7b, or its modified version from semi-embedded version to version of laying on the terrain (if the engineering-geological and hydro-geological survey prove that embedding is inappropriate due to adverse geo-technical and hydro-geological conditions) with overlaid (soil covered) tunnel under the following conditions:

- verify engineering-geological and hydro-geological conditions in the route of the entire section and based on the results of the survey works to optimise the direction and height of the highway route with emphasis on the section in the vicinity of Vajnory – embedding the highway under the terrain,
- design the Rača interchange for operation of the section in the necessary extent
- we recommend bringing in line the preparation and construction of the section Ivanka North – Rača Interchange with preparation and construction of the preceding section Jarovce – Ivanka North,
- comply with other proposed measures specified in the recommended conditions for phases of construction and operation of the works.

Description of the technical solution in the process of the mandatory assessment of highway D4 Ivanka North – Záhorská Bystrica in the section "Ivanka North – Rača".

The highway section of the structure under review commences at the connection to the preceding section D4 Jarovce – Ivanka North at crossroad D4 – D1, the end is at Rača Interchange.

Variant 7b commences at point 0.575 km, where the vertical alignments of both variants of Ivanka North interchange meet on embankment at height of approx. 6 m. The route of the highway continues for a short distance on the embankment westwards concurrently with Šúrsky channel. In section running in the vicinity of the built up area of Vajnory municipality (in distance of approx. 300 m from the north-eastern edge), the vertical alignment of the highway continues from point 0.900 km under the level of the terrain up to 1.600 km. It concerns a soil covered (subgrade) section of the highway entitled Vajnory tunnel. At point 1.263 km the flyover interchange (FOI) Čierna voda is located, where highway D4 crosses road III/5021 (D4 runs below III/5021).

Behind the tunnel the highway continues concurrently with Šúrsky channel on the up to 5 m high embankment towards the eastern slopes of Little Carpathians.

At point 2.524 km the highway crosses Račiansky potok (Rača creek) by a bridge structure. At point 3.250 km the highway runs closely above the terrain level and continues on the embankment, whose height is 8 m before FOI Rača.

In the section between FOI Ivanka North and FOI Čierna voda the one way two-lane collectors (concurrent roads) of category C 9,5/8 are designed on both sides of highway D4, to which the local roads will be connected. In the section between FOI Čierna voda and FOI Rača the one-way collector is proposed for only the southern part of D4 highway, through which the adjacent territory west of Vajnory municipality can be connected (CEPIT premises).

When compared to variants 2a, 2b, FOI Rača is shifted more northwards, while highway D4 crosses railway No. 120 Bratislava - Žilina and road II/502 (D4 runs over both the railway and road II/502). At point 3.765 km ahead of the interchange it crosses relocated field road by a bridge. Behind the short approx. 250 m long embankment up to 11 m high there is a bridge over the interchange branch and other two bridge structures of the interchange. Behind the interchange the vertical alignment reaches the terrain level and it is transformed into 300 m long cut.

Description of the technical solution of the proposed change

Background summary:

- "Feasibility and Suitability Study for Route of Highway D4 Bratislava Jarovce – Ivanka North – Stupava South – State Border between Slovakia and Austria, (prepared by DOPRAVOPROJEKT, a.s. in September 2009)
- Highway D, Ivanka North – Záhorská Bystrica, Assessment Report, HBH Project, s.r.o., December 2010
- ZS (EIA) "Highway D4, Ivanka North - Záhorská Bystrica" (No. 292/2011-3.4/ml) dated 7 February 2012
- Land-Use Planning Documentation concerning "Highway D4 Bratislava, Ivanka North – Rača", prepared by "D4 Bratislava, Jarovce – Rača" Association in October 2013

The structure of "Highway D4 Bratislava, Ivanka North - Rača" commences at the place of crossing with the existing highway D1 at FOI "Ivanka – North" at the border of cadastral territory Vajnory / cadastral territory Ivanka pri Dunaji in the vicinity of Šúrsky channel. Highway D4 continues in north-west direction in the cadastral territory of Svätý Jur, crosses Vajnorský potok (creek) by a bridge, passes by Lysec lake on its west side, crosses road III/5021 (Vajnory – Čierna voda) approx. 300 m from the eastern edge of the existing built-up area of BA - Vajnory municipality, continues concurrently with Šúrsky channel, crosses Račiansky potok by a bridge north-east of the planned CEPIT premises. In its final part the route runs towards the vineyards at the eastern edge of the Little Carpathians, where the the bridge of the flyover interchange "Rača" crosses railway Bratislava – Žilina and road II/502. The end of the section of highway D4 is at FOI "Rača". Construction of the connecting route of highway D4 is planned in the next phase together with the "Karpaty" tunnel at structure "Highway D4 Bratislava, Rača – Záhorská Bystrica". The total length of the section concerned of highway D4 is ***4.400 km***.

COMPARISON OF THE ORIGINALLY REVIED SOLUTION AND CHANGES IN THE PROPOSED SOLUTION

a) Changes in location of highway D4

The following changes occurred during preparation of the LUPD when compared to the solution specified in the Assessment Report:

- Location of highway D4 in the position under Technical Study "Highway D4 Bratislava, 15.0 km point, interchange Ivanka North – Rača Interchange", where the distance from Lysec lake was

increased in line with the recommendations of the Final Opinion of the Ministry of Environment SR (EIA),

- Change in the height of the route of highway D4 at FOI "Ivanka – North" under the conclusions from the elaborated analysis (D1/D4) and Technical Study "Highway D4 Bratislava, 15.0 km point, interchange Ivanka North – Rača Interchange" prepared on the basis of requirements and recommendations of the Final Opinion of the Ministry of Environment SR (EIA), running under the level of highway D1, by bridge over Vajnorský potok (creek) (underpass height h=4,20 m under the bridge), in the vicinity of the existing built-up area of Vajnory on the low embankment over the level of the current terrain, bridge over Račiansky potok (creek) (underpass height h=4,20 m under the bridge), at point 3.300 km of D4 on the low embankment over the level of the current terrain, continued by bridge over railway Bratislava – Žilina and over road II/502,

b) Changes in the interchanges

Solution under review (Plan)	**Change in the proposed solution (DCP)**		**Characteristics of the change to the proposed work**
	structure		
FOI "Čierna voda" in the shape of deltoid interchange	102	FOI "Čierna voda" in the shape of flyover deltoid interchange	Change in the location and shape of FOI "Čierna voda" due to existing outlook traffic data, the option of future connection of the new urban area in Vajnory directly to FOI "Čierna voda", avoiding the burdening of built-up area in the old Vajnory by traffic noise by new urbanisation, in the Vajnory area, collision free cycling route with regard to road No. III/5021
FOI "Rača", two-level shaped interchange	103	FOI "Rača" in the shape of flyover modified deltoid interchange including one bridge on highway D4 over railway Bratislava – Žilina and over road II/502.	Change in the shape of FOI "Rača" in line with the recommendation specified in the Assessment Report (EIA), lower construction costs, lower number of bridge structures, no need of walls, less technically challenging bridge structures over modernised railway line Bratislava - Žilina (minimum restrictions to railway transport) without affecting the overhead 400 kV EHV lines, creates space for the implementation of the plan of ZSE-D, a.s. and SEPS, š.p. to build the substation Tr 400/110/22 kV Vajnory, half of road II/502 maintains at the current position, the option of turning around at FOI "Rača", greater distance from PR Šúr

c) Changes to the relocated roads and reconstruction of roads

Solution under review (Plan)		**Change in the proposed solution (DCP)**		**Characteristics of the change to the proposed work**
No.		**structure**		
C1	Relocation of road III/5021 of categ. C7,5/50, 305 m long. Modification includes two small roundabouts.	111	Relocation of road III/5021 at 1.363 km of D4 in interchange "Čierna voda", categ. C 9,5/50, 1,274.18 m long	Change in situated relocation of road II/5021 due to change in solution of FOI "Čierna voda" and height of route D4, no need to destruct and build new bridge on r.III/5021 over Šurský channel

Solution under review (Plan)		Change in the proposed solution (DCP)		Characteristics of the change to the proposed work
No.		**structure**		
-	-	112-01	Local road at 1.600 km - 2.300 km of D4, categ. MZ 9,5/50, 760 m long	New structure in the cadastral territory Sv. Jur due to ensuring the option of connecting planned premises of CEPIT through FOI "Čierna voda" to highway D4
-	-	112-02	Local road at 2.300 km - 2.400 km of D4, categ. MZ 9,5/50, 173 m long	New structure in the cadastral territory Vajnory due to ensuring the option of connecting planned premises of CEPIT through FOI "Čierna voda" to highway D4
-	-	112-03	Local road at 2.400 km - 2.600 km of D4, categ. MZ 9,5/50, 331 m long	New structure in the cadastral territory Vajnory due to ensuring the option of connecting planned premises of CEPIT through FOI "Čierna voda" to highway D4
C2	Relocation of field road at 3.765 km of category P6/40, 680m long	113	Relocation of local road at 3.810 km of D4 in NPR Šúr, categ. 2L 4/30, 662.12 m long	More detailed specification of the position and length with regard to exist. gas pipeline VTL
-	-	114	Relocation of field road at 0.590 km of D4, categ. 2L 4/30, 803.50 m long	New structure for ensuring access to the land divided by structure
C3	Modification of road II/502 at FOI "Rača", 1,998 m long	115-01	Relocation of road II/502 at 4.183 km of D4 in cadastral territory Svätý Jur, 3,359.73 m long	Change in the position of relocation and extent in cadastral territory Sv. Jur due to change in the shape of FOI "Rača"
-	(see above)	115-02	Relocation of road II/502 at 4.183 km of D4 in cadastral territory Vajnory, 3,359.73 m long	Change in the position of relocation and extent in cadastral territory Sv. Jur due to change in the shape of FOI "Rača"
C4	Relocation of field road at FOI "Rača", categ. P 6/40, 1200 m long	116-01	Relocation of field road at 4.400 km of D4 in cadastral territory Svätý Jur, categ. P 6/40, 1336.62 m long	Change in the position of relocation and extent of field road in cadastral territory Sv. Jur due to change in the shape of FOI "Rača"
	(see above)	116-02	Relocation of field road at 4.400 km of D4 in cadastral territory Vajnory, categ. P 6/40, 1336.62 m long	Change in the position of relocation and extent of field road in cadastral territory Vajnory due to change in the shape of FOI "Rača"
C5	Bypass on road III/5021 at 1.262 km, category C 7,5/50, 550 m long	151	Bypass on road III/5021 at interchange "Čierna voda", 280 m long	Change in the extent due to change in the shape of FOI "Čierna voda"
-	-	152	Bypass on road III/5021 at	New structure due to

Solution under review (Plan)		Change in the proposed solution (DCP)		Characteristics of the change to the proposed work
No.		**structure**		
			interchange "Rača"	required redirecting of traffic during construction of FOI "Rača"
-	-	153	Readjustment of 2nd and 3rd class roads (after completion of construction)	New structure of readjusted 2nd and 3rd class roads after completion of construction, if required even during construction of highway D4

d) Changes to bridge structures

Solution under review (Plan)		Change in the proposed solution (DCP)		Characteristics of the change to the proposed work
No.		**structure**		
M1	Bridge on D4 at 0.484 km over Struha creek, 23.5 m long	201	Bridge on D4 at 0.580 km over Vajnorský potok (creek), 58.75 m long	Change to location of the bridge, width and span of the bridge due to the change in position of D4 in greater distance from the Lysec lake, the requirement under ZS (EIA)
M2	Bridge on collector at 0.484 km left of Struha creek, 23.5 m long	-	-	Cancelled, at the point of crossing the creek the collectors were removed, D4 is 6-lane
M3	Bridge on collector at 0.484 km right of Struha creek, 23.5 m long	-	-	Cancelled, at the point of crossing the creek the collectors were removed, D4 is 6-lane
M4	Bridge over D4 at 1.262 km in FOI "Čierna voda", 108 m long	202	Bridge on road III/5021 at 1.363 km over highway D4, 131.19 m long	Change to location and span of the bridge due to change in FOI "Čierna voda"
-	-	203	Bridge on MK at 1.573 km over highway D4 in interchange "Čierna voda", 69.30 m long	New structure due to change in the solution of FOI "Čierna voda"
M5	Sealing tub overlay 700 m long	204-01	Wildlife crossing at 1.948 km of D4, 100m long	Change in the scope of overlay of the highway due to height of D4 on low embankment over surface water level and solution of FOI "Čierna voda" in line with conditions for verification in ZS (EIA)
-	-	204-02	Wildlife crossing at 1.948 km of D4, 100 m long	Ditto
M6	Bridge on D4 over Račiansky potok (creek), 21m long	205	Bridge on D4 at 2.560 km over Račiansky potok (creek), 51.47 m long	Change in the bridge span due to need to reduce thickness of the bridge
M7	Bridge on collector of D4 on the left over Račiansky potok	-	-	Cancelled due to omitting the collector on the left side,

Solution under review (Plan)		Change in the proposed solution (DCP)		Characteristics of the change to the proposed work
No.		**structure**		
	(creek), 21m long			different way of connecting CEPIT
M8	Bridge on D4 and platform 41 at 3.765 km over relocation of asphalt road, 70 m long	206	Bridge on D4 at 3.810 km over local road in NPR Šúr, 11.58m long, w=.	More detailed specification of the position and length of the bridge in line with routing MK to NPR Šúr and change of FOI "Rača" (platform 41 is cancelled)
M9	205-00 Bridge on highway D4 over platform 41 of FOI "Rača", 26.58 m long	-	-	Cancelled due to change in the shape of FOI "Rača"
M10	206-00 Bridge on highway D4 over road II/502, railway and road at FOI Rača,154.70 m long	207	Bridge on D4 at 4.160 km over railway ŽSR Bratislava - Žilina at 10.760 km of railway, 131.19 m long	Change in length of the bridge specified on the basis of a detailed geodetic survey and the proposed shape of FOI "Rača"
M11	Bridge on collector of D4 on the left over road II/502, railway and road at FOI Rača,154.70 m long	-	-	Cancelled due to change in the shape of FOI "Rača"
M12	207-00 Bridge on highway D4 over platform 2 of FOI Rača, PM 115 m long, LM 95 m long	-	-	Cancelled due to change in the shape of FOI "Rača"
M13	Bridge on collector of D4 on the left over platform 2 at FOI Rača,95 m long	-	-	Cancelled due to change in the shape of FOI "Rača"
M14	221-00 Bridge on platform 12 at FOI Rača at 0.415 km through road II/502, 166.70 m long	-	-	Cancelled due to change in the shape of FOI "Rača"
M15	222-00 Bridge on platform 2 at FOI Rača at 0.215 km over railway, 110.50 m long	-	-	Cancelled due to change in the shape of FOI "Rača"
M16	223-00 Bridge on platform 2 at FOI Rača at km over railway and road II/502, 166.50 m long	-	-	Cancelled due to change in the shape of FOI "Rača"
M17	224-00 Bridge on platform 41 at FOI Rača at 0.298 km over railway and road II/502, 166 m long	-	-	Cancelled due to change in the shape of FOI "Rača"
M18	225-00 Bridge on platform 5 at FOI Rača at 0.445 km over railway, 175.20 m long	-	-	Cancelled due to change in the shape of FOI "Rača"
-	-	208	Bridge on "BS" branch at interchange "Rača" over relocation of road II/502, LM 46.05 m long, PM 47.05m long	New bridge structure due to change in the shape of FOI "Rača"
-	-	209	Bridge on "SB" branch at interchange "Rača" over relocation of road II/502, LM 47.48 m long, PM 47.28m long	New bridge structure due to change in the shape of FOI "Rača"

Solution under review (Plan)		Change in the proposed solution (DCP)		Characteristics of the change to the proposed work
No.		**structure**		
-	-	210	Bridge on MK at 2.300 km of D4 over Vajnorský potok, 11.62 m long	New bridge structure due to change in the shape of FOI "Rača"
-	-	211	Bridge on MK at 2.600 km of D4 over Račiansky potok, 38.80 m long	New bridge structure due to change in the shape of FOI "Rača"

e) Changes in structures of relocations and adjustments of watercourses

Solution under review (Plan)	Change in the proposed solution		Characteristics of the change to the proposed work
	structure	**DCP**	
The Assessment Report does not specify any adjustments to watercourses	320	Adjustment of Račí potok (creek) at interchange "Rača", 189 m long	Shifting waters of Račí potok at the point of its crossing with branches of FOI "Rača"
	321	Adjustment of an unnamed creek at interchange "Rača", 212.12 m long	Shifting waters of the unnamed creek at the point of its crossing with branches of FOI "Rača"

f) Changes to the relocations of utilities

In the route of the proposed structure there are currently many utilities, lines and other facilities located in the entire section of highway D4 and related roads. In the points of intersection with the traffic corridors they are considerably accumulated.

During preparation of land-use planning documentation (LUPD) the scope of relocating the utilities was updated with regard to Assessment Report (EIA) for the following reasons:

- Detailed geodetic survey of the existing status along with setting the utilities during preparation of LUPD,
- The need to incorporate the comments and requirements of the administrators of the utilities concerned (opinions during preparation of LUPD),
- Detailed specification how to deal with the relocations due to need of coordinating them with other facilities related to the structure in question,

The following construction facilities and relocation of the operating sets of the utilities and new utilities were proposed in LUPD:

Sewerage, water supply, irrigation and drainage

501 Drainage of highway D4
502 Relocation of pressure sewerage DN250
510 Adjustment of water supply system DN 400 at 1.291 km of D4
511 Relocation of water supply pipeline DN 500
520 Relocation of irrigation pipeline DN 600 at 1.225 - 2.540 km of D4
521 Relocation of irrigation pipelines DN 250 at 0.000 - 2.350 km of D4
522 Adjustment of drainage in the cadastral territory Vajnory
523 Adjustment of drainage in the cadastral territory Svätý Jur

Facilities with power lines of VHV, HV, LV, VO

601 Relocation of overhead line VHV 110 kV l.No. 8708, 8710 at 4.020 km of D4
611 Relocation of overhead line HV 22 kV l.No. 210, 1106 at 1.200 km of D4
612 Relocation of overhead line HV 22 kV l.No. 210, 263 at 3.450 km of D4
613 Relocation of overhead line LV at 3.830 km of D4
614 Relocation of overhead line HV 22 kV l.No. 139, at 4.046 km of D4
615 Relocation of overhead line HV l.No. 1015, at 4.060 km of D4
616 Cable line HV 22kV from TS10, interchange D1-D4 - TS12 Rača

617 Connection of VO D4 at 0.000-1.140 km
620 LV connection line for ISD at 0.350 km of D4
621 LV connection for VO of highway D4 at interchange "Čierna voda"
622 LV connection for VO of road III/5021 at interchange "Čierna voda"
623 LV connection line for wildlife crossing at 1.950 km of D4
624 LV connection line for ISD at 4.240 km of D4
625 LV connection for VO of highway D4 at interchange "Rača"
626-01 LV connection for VO of road II/502 at interchange "Rača" in cadastral territory Svätý Jur
626-02 LV connection for VO of road II/502 at interchange "Rača" in cadastral territory Vajnory
627 Kiosk transformer station TS11 at interchange "Čierna Voda"
628 Kiosk transformer station TS12 at interchange "Rača"
630 Public lighting of D4 at interchange "Ivanka-North" at 0.000 - 1.140 km
631 Public lighting of D4 at interchange "Čierna Voda"
632 Public lighting of road III /5021 at interchange "Čierna Voda"
633 Public lighting for wildlife crossing at 1.950 km of D4
634-01 Public lighting of the local road at 1.600-2.300 km of D4
634-02 Public lighting of the local road at 2.300-2.600 km of D4
635 Public lighting of D4 at interchange "Rača"
636-01 Public lighting of road II/502 at 4,183 km of D4 in cadastral territory Svätý Jur
636-02 Public lighting of road II/502 at 4,183 km of D4 in cadastral territory Vajnory
637-01 LV connection line for VO of the local road at 1.600-2.300 km of D4
637-02 LV connection line for VO of the local road at 2.300-2.600 km of D4

Lines of ŽSR
651 Temporary adjustment of contact line at 10.760 rkm (4.136 km of D4)
661 Relocation of DK ŽSR at 4.105 km of D4

Gas pipelines
701 Adjustment of gas pipeline VTL DN 200 at 3.811 km of D4

Communication lines
751 Relocation of DK cables of SLOVAK TELEKOM at 1.290 km of D4
752 Relocation of MOK cables of SLOVAK TELEKOM at 1.290 km of D4
753 Relocation of DK cables of SLOVAK TELEKOM at interchange "Čierna voda"
754 Relocation of DK cables of SLOVAK TELEKOM at 1.300 -2.900 km of D4
755 Relocation of DK cables of SLOVAK TELEKOM at 3.320 -3.470 km of D4
756 Relocation of DK cables of SLOVAK TELEKOM at 3.400 km of D4
757 Relocation of overhead tf. lines of SLOVAK TELEKOM at 3.400 km of D4
758 Protection of DOK cables of SLOVAK TELEKOM at 4.170 km of D4
759 Protection of DK cables of SLOVAK TELEKOM at 4.170 km of D4
760 Relocation of DOK cables of ORANGE at interchange "Rača"

Information system
791-01 Information system of D4 - construction part
792-01 Information system on existing road II/502 at interchange "Rača" – construction part

Operating sets
791-02 Information system of D4 - technological part
792-02 Information system on existing road II/502 at interchange "Rača" – technological part

The proposed relocations of the utilities and new utilities are located in the close vicinity of the proposed structure, they form necessary part of the highway structure under construction.

g) Changes in the noise control measures

During preparation of land-use planning documentation (LUPD) the scope of noise control measures was updated in the Noise Study, with regard to Assessment Report (EIA), based on the updated outlook traffic data a according to the Decree of the Ministry of Health SR, where the impact of the traffic on the existing built-up area after launching into operation.

At places where construction of the primary noise control measures would be inappropriate, or costly, the façade adjustments are proposed.

In LUPD the following noise control measures were proposed:

261 Noise barrier at 0.450 - 1.355 km of D4 on the right
262 Noise barrier at 0.400 - 1.650 km of D4 on the left
263 Noise barrier at 2.000 - 3.950 km of D4 on the right
264 Noise barrier at 2.000 - 2.950 km of D4 on the left
265 Noise barrier at "VA-ST" branch on the right at interchange "Čierna voda"
266 Noise barrier at "ST-VA" branch on the right at interchange "Čierna voda"
267 Noise barrier at "VA-CV1" branch on the left at interchange "Čierna voda"
268 Noise barrier at "VA-CV1" branch on the right at interchange "Čierna voda"
269 Noise barrier at "CV-VA" branch on the left at interchange "Čierna voda"
270 Noise barrier at "VA-CV2" branch on the right at interchange "Čierna voda"
281 Façade adjustments in Vajnory at 1.200 - 1.600 km of D4 on the left

III.3 Connection with other planned and performed activities in the territory concerned

Highway D4 represents the traffic connection of the existing highway routes D1 and D2 in the southern, eastern and northern part of the Capital City of Bratislava. In addition to the aforementioned highway connection D4 highway will be a significant international connection of Slovakia and Austria with traffic connections to Hungary and Czech Republic.

III.4 Type of Requested Permit for the Proposed Activities under Special Regulations

Permit under special provisions of Act No. 50/1976 Coll. Land Use Planning and Construction Rules (*Construction Act*) as amended.

III.5 Statement on Anticipated Cross-Border Impacts of the Change to the Proposed Works

Changes to the proposed works will not have any impact beyond the borders of the Slovak Republic.

III.6 Basic information about the current status of the environment of the territory concerned

Information on the current status of the environment are taken from Assessment Report and its annexes (HBH Projekt, spol. s.r.o., 2010) and from partial surveys prepared for the project documentation concerning LUPD (Engineering and Geological Survey, INGEO Žilina 2013, Pedological Survey, Lazúrová, 10/2013, Stocktaking and Social Evaluation of Woods, Zvědelík 2013, Stocktaking and Social Evaluation of Habitats of Community and National Importance, Zvědelík 2013). Given the needs of this notice the information about the current status of the environment is partially curtailed or supplemented in line with the amendment legislation.

III.6.1 Geological Conditions

From the viewpoint of the engineering and geological classification the territory under review is a part of region with Neogene tectonic furrows, the area of inner Carpathian lowlands – Danubian Lowland, its western edge at the foot of the Little Carpathians.
In the section the subsoil of highway D4 is made of the peripheral sections of the alluvial plains of the Danube, which is unevenly covered by proluvial sediments and deluvial sediments at the foot, with thickness exceeding 2 - 5 m. The overlay range of fluvial sediments at the mouth of the significant creeks is 1.0 to 1.5 km from the foot of the slopes. The deluvial sediments are developed in the as a continuous layer on the foot of the slopes up to the level of road Rača – Jur pri Bratislave. Proluvial forehead sediments in the cones are always stronger in the foreground foot of the slopes. Thickness of quaternary is anticipated up to 2 - 10 m. Subsoil of quaternary sediment formations was up to the level of road II/502 Rača - Jur pri Bratislave made in Neogene, crystalline massif towards the Little Carpathians. The contact of two units is tectonic, steeply towards the Danube plain by inclined faults. In the foothills of the Little Carpathians the rock mass is composed mostly of weather-worn loosened Crystalline with thicker deluvial soils. At the point of crossing with Vajnorský potok valley is filled with fluvial sediment mountain stream filled with loamy sandy and gravelly soils.

III.6.2 Geomorphological Conditions

The territory under review is a part of Fatra and Tatra geomorphological region. Overview of geomorphological units:

system - Alpine-Himalayan
province - Western Pannonian Basin
subprovince - Small Danube Fold
region - Danubian Lowland
unit – Danubian Flat

Except for the eastern slopes of the Little Carpathians at the north-western edge of the section of D4 Ivanka North – Rača, the relief of the territory concerned can be characterised as purely flat, slightly disturbed by anthropogenic activities (dams, road embankments, gravel pits etc.).
The altitude in the territory of D4 and its vicinity ranges from 127 MASL to 135 MASL, the only part of the territory concerned, which is above this threshold, is the site near the interchange Rača where max. altitude is 155 MASL.
In terms of typology of the relief division a considerable part of the territory is characterised by the fluvial relief.

The Danubian Flat forms the southern part of the Danubian Lowland. It occupies the floodplain of the Danube and its tributaries with terraces. Originally the Danube flowed through the centre of Žitný Island, where it formed a massive aggradation wall, from which slipped and divided at the end of the Ice Age, and formed today's Žitný Island. The Danube and Little Danube deposit their aggradation mounds, while the highest part of the old aggradation mound is less waterlogged, it includes remnants of overgrown river basin partially it is covered especially by thin layers of floury materials. Floes droop so that the territory in downstream direction of the Danube is reduced, thus increasing waterlogging, the most is at the bottom of Žitný Island in contact with aggradation mounds where groundwater is near the surface. Relief is mostly flat.

III.6.3 Climate Conditions

The territory concerned belongs to a warm A1 district, which is characterised as warm, dry, with mild winters and longer sunshine. In the territory the average annual precipitation is 530 mm to 650 mm, with maximum precipitation in the summer (34.5%), particularly in July, affected by the local thunderclouds. Conversely, the least precipitation falls in winter, in February. The main rainfall deficit is in the vegetation season with the most of the precipitation, but also the greatest vapour (800 mm a year on average). Soil moisture deficit is further worsened by strong and frequent winds. From the viewpoint of precipitation the territory can be characterised as a slightly dry region.

It is usually stated that winter season lasts 40 days, while many winters are snowless. The first freezes occur in October. The depth of freezing at an index of frost I_m 350 is 94 cm. There are approximately 100 summer days. The sum of temperatures exceeding 10 °C ranges from 3 000 to 3 200, where the value is highest in August and lowest in December. Average annual air temperature ranges from 9 to 10 °C. The warmest month is July with an average temperature of 20.2 °C, the coldest month is January with an average temperature of -1.8 °C. The territory is characterised by a frequent occurrence of inversions. In the Danubian Lowland the west to north-west winds prevail. Windless situations are rare. The strongest winds are weakest in March and in December. In the territory concerned the NW to SE winds with average speed of 3 m/s prevail. Average monthly maximum is 5.9 m/s.

III.6.4 Water

Surface water
The current situation of the surface waters in the territory under review reflects the extensive human activity, in particular the drainage adjustments from the end of 19th century. The watercourses are modified and regulated so as to drain the water from the slopes of the Little Carpathians and subsequently from adjacent plains. The network of the original watercourses is supplemented with the mesh of artificial drainage channels so that they enable the use of adjacent areas for agricultural and other purposes to the maximum extent possible. On the eastern side of the Little Carpathians the main watercourses include Čierna Voda and Šúrsky channel. The territory under review is included in the Danube river basin and it is drained by the watercourses below.

Šúrsky channel
– artificial drainage and irrigation channel built during the WWII, which serves for draining waters from the Little Carpathians

– the channel is connected to watercourse Blatina close to Pezinok - Grinava (Myslenice) and flows into Small Danube behind Ivanka pri Dunaji municipality
– the stream is regularly maintained, with sporadic incidence of riparian vegetation (poplars, etc.), the bed is overgrown with aquatic plants
– under Decree of the Ministry of Environment SR No. 211/2005 Coll., as amended, and Annex No.1 included in the important watercourses in terms of water management in the entire section.

Javorník (also known as Račí potok)
– the spring of the watercourse is located between Malý and Veľký Javorník in Small Carpathians and flows into the Šúrsky channel, the upper stream is undeveloped and has a torrent nature, in its part under road II/502 in Rača – Pezinok section the watercourse is regulated and straightened. It flows into the Šúrsky channel through the stabilisation facility.

Račiansky potok
– it springs under Krásny vrch (411 MASL) in the area of Little Carpathians, runs through Rača municipality and flows into Šúrsky channel north of the Vajnory municipality
– no riparian vegetation, while shrubs and trees grow beyond the heel of the dam, edges of the stream are covered with reed, the bed overgrown with aquatic plants
– in the territory concerned (downstream) the watercourse is artificially enclosed on both sides

Struha
– it springs in the chalet settlement between vineyards north of Rača and flows into Vajnorský potok
– the entire watercourse is adjusted, determined to collect water from the vineyards, it does not flow year-round
– in its downstream part it is a recipient of wastewater
– the watercourse is called by the administrator as Dolnoračiansky in the section starting from the proposed area of Cepit, from the crossing with the Račiansky potok, it is administered by SVP š.p, OZ Povodie Dunaja, Správa vnútorných vôd Šamorín (Danube River Basin, Civic Association, Water Administration Šamorín), it is fenced, it has installed inverted syphon 5 under Šúrsky channel (it underpasses) and flows into Čierna Voda

Vajnorský potok
– it springs in Little Carpathians under Biely Kríž, flows into Strúha creek
– the watercourse springs in Little Carpathians under the hill of Biely Kríž, the upper stream has a torrent nature, adjusted in the vineyards

Vajnorský channel
– built as a drainage channel south of Vajnory municipality
– it is the right side tributary of Strúha creek

Stará Blatina
– a channel between Čierna voda and Šúrsky channel without year-round flow

Mlynský potok
– artificial channel between Slovenský Grob and Chorvátsky Grob municipalities to remove excess water from the surrounding fields, without year-round flow, *nameless channel*
– artificial channel from Šalaperská hora towards Bernolákovo flowing into pool without discharge, east of Bernolákovo

Water Areas
Šúrsky rybník (pond) and swimming pools
– a part of NNR Šúr, one of the pools is a former gravel pit
– bodies of water are used for fish farming and recreational purposes

pond over Lyso
– close the the crossing point of Vajnorský potok and Šúr channel
– overgrown floodplain forest and used for fish farming

Groundwater

According to the Hydrogeological Regionalisation of Slovakia (Šuba et al., 1984) the wider area of the territory under review is a part of region Q - 051 "Quaternary of the Western Edge of the Flat". The main groundwater collector is the complex of quaternary fluvial sediments – ballasts. The hydraulic properties of gravel are good.
Calculated values of filtration coefficient (ranging from 2.80,10-5 to 3.98,10-4 m.s-1) are characteristic for gravels in the section Ivanka North - Rača as slightly to quite strongly permeable with low to medium flow capacity. In the entire section under review the groundwater has a free character and was situated at a depth of 1.00 to 4.00 meters below the surface.
By its long-term monitoring of groundwater level SHMÚ Bratislava documented minor differences between the maximum and minimum weaving groundwater levels (the limited impact of the Danube). The maximum weaving of the ground water level was at probe 710 (3.33 m, from 0.27 to 3.60 m below the surface), and the minimum at probe 712 (2.27 m, from 0.70 to 2.97 m below the surface). Recorded ground water levels in the monitoring wells of SHMÚ did not reach the peak values of long-term observation.
The quantities of groundwater in the fluvial sediments are composed of and supplemented by infiltrating surface water from Danube, but particularly transferred groundwater from Little Carpathians. In general the ground water flows approximately in NW-SE direction.
The Neogene sediments form the basin of the geothermal waters. Probably it concerns a structure with interlayer overflow, intergranular permeability and regime of surface water tension. Low temperature geothermal water (42 - 92° C) are bound to sandstone of Pannonian, Dacian and Pontian age.
The quality and composition of the groundwater is mainly influenced by the chemical composition of water of the Danube and the Little Danube, and by rainwater to a lesser extent. A very important factor is the anthropogenic activity that adversely affects the increase in content of SO_4^{2-}, NO_2^-, NO_3^-, NH_4^+, Cl^- and "oil substances".

III.6.5 Soil

Presence and distribution of various soil types with different characteristics in the landscape is the result of a specific combination of certain environmental factors, namely the soil-forming factors. The nature of the climate and topography, soil-forming substrate and the influence of vegetation, but mainly dominant factor of sedimentation and water regime on the alluvium of the Danube River in the territory concerned have created the conditions for the genesis of soils with dominant soil-forming process of accumulating organic matter - Mollic soil - Mollic and chernozem. In addition to the dominant soil type chernozem and Mollic soil on the route of the structure there is one location of alluvial soils - fluvial typically shallow soils and at the end section there are vineyards with cultivated soil.

According to the Pedological Survey (Lazúrová, 10/2013) **the soils classified in the Mollisol**, **included in the subtypes typic Mollisol and gley Mollisol**, prevail at the route of the structure, while these subtypes alternate forming mosaic in the territory concerned. In addition to Mollisol soils there is **chernozem** in subtypes typic chernozem and Mollic chernozem in the southern part of the route. In the northern part of the section there is one location with shallow **fluvisols** and gley fluvisols. Soils in the vineyards at the end of the section are classified as typic **anthroposols** and cambisol anthroposols.

They are mostly high quality deep soils with moderate to very deep high quality humus horizon, with no skeleton in the entire profile. In the northern half of the route there are also rocky and shallow soils. As soil-forming substrate there are alluvial sediments with predominantly sandy loam to loam sandy texture, sometimes with an admixture of gravel. Anthroposols substrate in the vineyards at the end of the section are deluviums of crystalline rocks.
From the viewpoint of soil type classification most of the soils at the route of the structure are included in the category medium heavy - loam soils. Light - loam sandy and heavy - clay loam soil at the route of the structure occur only locally on small acreages.
Soils at the route of the structure are mostly deep to medium deep and with no skeleton in its southern part. In the northern part of the route towards the foothills of the Little Carpathians, there is increase in the soil profile skeleton and locally there are shallow to gravelly soils.

Based on the results of the pedological survey on the area of the planned taken lands the overburden of humus horizon in the range from 20 to 60 cm is proposed, while at the majority of the route the overburden to a depth of 30 cm is proposed. Humus horizons of the soils concerned are shallow to deep, mostly medium heavy - clayey, with no skeleton up to medium stony.
From the viewpoint of agricultural land protection under Act No. 220/2004 Coll. on Soil Protection and Decree No. 508/2004 Coll. when carving out the land from the PPF (Agricultural Land Fund) it is necessary to prepare the documentation concerning Balance of Overburden of Humus Horizon of

Agricultural Land separately for permanently and temporarily taken lands under the structure and project of reclaiming the temporarily taken land for the structure.

III.6.6 Fauna, Flora and Vegetation

Flora and vegetation

The potential vegetation reflects the current ecological potential of the land. It displays natural vegetation which would be gradually created in the future, if people stopped affecting the vegetation cover by their activities. Potential communities are present in the territories concerned according to the map of potential vegetation (Atlas krajiny SR (Landscape Atlas of Slovakia), 2002). In the Danubian Lowland, namely in the territory under review, it concerns ash-elm-oak forests in basins of major rivers (hardwood floodplain forests). There are also Carpathian oak-hornbeam forests and oak, Austrian oak forests and oak forests with Tatarian maple and Downey oak. At the foothills of Little Carpathians it concerns vegetation of the oak-hornbeam forests with smaller areas of oak and Austrian oak forests. In the centre of mountains there are mountainous beech forests.

The Assessment Report on the impact of highway D4 in section Ivanka North – Záhorská Bystrica and its separate annex concerning the Impact on Favourable Status of the Habitats identified the habitats in the route of highway D4 at approx. 0.5 km, i.e. right after the interchange Ivanka North, at approx 2.5 km and approx. 4.7 km ahead of the tunnel portal. In this area at point of 0.5 km ("Na Lysom") there is a significant site with the body of water and remnants of the floodplain forest in its vicinity, which represent the nesting habitat for several species of water and cavity birds living by the water areas, e.g. common kingfisher (*Alcedo atthis),* common sandpiper *(Actitis hypoleucos),* tufted duck *(Aythya fuligula)*. Relatively rare botanic site due to presence of rare plants (flowering rush*(Butomus umbelatus),* Shining Meadow Rue *(Thalictrum lucidum))*. The site has a much higher value as a habitat. It is a valuable refuge not only for plants in urban and agricultural landscape. Site should be as far as possible preserved as irreplaceable bio-centre in the surrounding landscape.
The habitat of European importance - Ls1 - Floodplain forests was identified in the site. The measures recommended shifting the route of the highway further from the lake, which was accepted by LUPD to the extent possible.

At 2.5 km there is a habitat of national importance - Lk10 – Vegetation of tall sedge – in the site this habitat is bound to littoral parts of the drainage channel.

At approx. 4.7 km, i.e. right ahead of the tunnel portal the following habitats were identified: habitat of Community importance – Ls5 – Beech and mixed beech forests and priority habitat of Community importance Br4 – Alpine rivers and their ligneous vegetation with grey willow. A part of the habitat is being destroyed.

The project documentation of LUPD includes annexes Stocktaking and Social Evaluation of Woods, and Stocktaking and Social Evaluation of Habitats of Community and National Importance (both prepared by Zvědelík 2013).

In the survey made in October 2013 the priority habitat of the Community importance was identified in one site, it concerns habitat **Ls1.1 Willow-poplar lowland floodplain forests - priority habitats of Community importance**, which is located at section 2.4 - 2.6 km of the planned access road.

Under Act No. 117/2010 Coll. amending and supplementing Act No. 543/2002 Coll. on Protection of Nature and Landscape, as amended by Act No. 24/2006 Coll. on Environmental Impact Assessment amending other acts, as amended, Section 6, par. 2 if the Nature and Landscape Protection Authority in its statement under Section 9, par. 1 notices that if the works, for which the statement is issued, can damage or destroy the habitat of the Community importance or habitat of the national importance, such works require consent of the Environmental District Authority.

According Stocktaking and Social Evaluation of Woods growing outside the forests in the route of the proposed highway D4 there are woods at 39 sites in the cadastres of Ivanka pri Dunaji, Svätý Jur a Vajnory municipalities.
During the stocktaking it was identified that woods grow as accompanying vegetation roads, watercourses, drainage ditches, trees along dikes Šúrsky channel, sparse landscaping greenery in agricultural land and a vineyard. During stocktaking a total of 883 pieces of trees and 47,690 m2 of bush vegetation were recorded. **Out of this number the consent of the Nature and Landscape Protection**

Authority is required for 355 pc of trees and 47,690 m^2 of bush vegetation, whose social value amounts to EUR 608,161.26.

Fauna

From the zoo-geographic viewpoint (Čepelák, 1980) the territory concerned is included in two provinces, namely Carpathians and Inner Carpathians Lowlands. The Carpathian province outreaches here through the area of the West Carpathians with the inner periphery (West District) and Inner Carpathian Lowland outreaches here through the Pannonian area with South Slovakia district (Danubian riparian and upland district). The route of highway D4 in section Ivanka North – Rača runs through a insignificant territory, which is currently fragmented and disturbed by intensive traffic and increasing number of development projects. This territory provides conditions for the permanent occurrence of small animals up to the size of foxes and limited conditions for occurrence of larger animals (deer, wild boar). Much better life conditions for various animal groups are provided by the territory outside the route of the highway, which is also subject to territorial protection. In particular, it concerns Little Carpathians and Šúr.

III.6.7 Special protection areas and protective zones

In the wider territory surrounding highway D4 the following large and small protection areas are located (Act of the National Council SR No. 543/2002 Coll. on Nature and Landscape Protection):

PLA Little Carpathians

- determined by Decree of Ministry of Culture SSR No. 64/1976 Coll. dated 5 May 1976,
- the scope and conditions of protection are set by Section 18 of Act No. 543/2002 Coll., on Protection of Nature and Landscape, as amended. The second degree of protection applies to the protected landscape area, unless the Act specifies otherwise (Section 13).
- PLA Little Carpathians is the only large protection area of the vineyard nature. The only accessible cave in the PLA is the Driny cave in Smolenice Karst. The territory is largely covered by deciduous forests with oak, common ash, sycamore maple and linden. The thermophilic grassland communities include pheasant's eye, scented grass, greater pasque flower, Lumnitzers Nelke (Dianthus lumnitzeri).
The species that occur only here within Slovakia include mouse thorn, scorpion senna, rock buckthorn. The Little Carpathians have a generically very varied fauna (insects, birds, etc.).

NNR Šúr

- determined by Decree of the Regional Environmental Authority in Bratislava No. 1/2009 dated 25 May 2009, which declares the natural reserve Šúr and its protective zone - from 1 June 2009
- protective zone declared under Section 17, par. 3 of Act No. 543/2002 Coll.
- object of protection is the last and greatest remnant of high trunk boggy alder forest, with wet and peaty meadows around its periphery. There are also xerotherm biocenosis. Rich biodiversity at small area, many endangered taxons.

In connection with the entry of the Slovak Republic to the European Union, our country adopted a commitment to establish a network of protected areas for conservation of the natural heritage that is important not only for the Member State concerned, but particularly for the EU as a whole. System of protected areas - **Natura 2000** is intended to ensure the protection of the rarest and most endangered species of wild plants, wildlife and natural habitats occurring in the territory of the European Union and by protecting these species and habitats to ensure the conservation of biological diversity throughout the European Union.
The network of NATURA 2000 sites include special protection bird areas and sites of Community importance. In the vicinity of the designed highway D4 the following territories were proposed, based on existence of habitats with rare plants and animals, accepted by our government and approved by the European Commission:

SKCHVU014 Little Carpathians

- determined by Decree of the Ministry of Environment SR No. 216/2005 Coll., as amended, effective from 1 June 2005, - in the portal part of the tunnel the route touches the edge of this special protection area,
- declared for the purpose of preserving the habitats of bird species of Community importance and habitats of migratory species of birds: saker falcon (*Falco cherrug*), European honey buzzard (*Pernis apivorus*), middle spotted woodpecker (*Dendrocopos medius*), Eurasian eagle-owl (*Bubo bubo*),

European nightjar (*Caprimulgus europaeus*), black stork (*Ciconia nigra*), white-backed woodpecker (*Dendrocopos leucotos*), Syrian woodpecker (*Dendrocopos syriacus*), black woodpecker (*Dryocopus martius*), peregrine falcon (*Falco peregrinus*), collared flycatcher (*Ficedula albicollis*), red-breasted flycatcher (*Ficedula parva*), red-backed shrike (*Lanius collurio*), grey-headed woodpecker (*Picus canus*), barred warbler (*Sylvia nisoria*), common quail (*Coturnix coturnix*), Eurasian wryneck (*Jynx torquilla*), spotted flycatcher (*Muscicapa striata*), common redstart (*Phoenicurus phoenicurus*), common stonechat (*Saxicola torquata*), European turtle dove (*Streptopelia turtur*) and eastern imperial eagle (*Aquila heliaca*).

SKUEV0279 Šúr

- determined by Decree of the Ministry of Environment SR No. 3/2004-5.1 dated 14 July 2004
- approx. 500 m north of route D4 in section from 1.500 km to 3.500 km (acreage smaller than the acreage of NNR Šúr)
- declared in order to protect habitats of Community importance: riparian willow-poplar and alder forests (91E0), riparian oak-elm-ash forests around lowland rivers (91F0), Molinia meadows (6410), salt marshes and salt meadows (1340) and species of European importance: thistle *(Cirsium brachycephalum),* great capricorn beetle (*Cerambyx cerdo*), violet click beetle (*Limoniscus violaceus*),large copper
(*Lycaena dispar*), stag beetle (*Lucanus cervus*), False Eros Blue (*Polyommatus eroides*), European fire-bellied toad (*Bombina bombina*), Eurasian beaver (*Castor fiber*), tundra vole (*Microtus oeconomus mehelyi*) and Danube crested newt (*Triturus dobrogicus*).

Wetlands

Wetlands are protected as an important landscape component under Act No. 543/3002 Coll. as amended. At international level the wetlands are in addition to the EU Habitats Directive and the Birds Directive protected in particular by the Convention on Wetlands (Ramsar Convention), to which the Slovak Republic acceded on 1 January 1993. Under the Ramsar Convention in the cadastral territory of Svätý Jur there is **the Šúr wetland of European Importance**.

The route of the designed highway D4 is situated in the territory, where the 2nd degree of protection, i.e. general protection, applies. Higher protection degree territories are located east of the route (NNR Šúr with 5th protection degree and protective zone with 4th protection degree) and northwards it continuous by the tunnel route of Little Carpathians, where PLA Little Carpathians is declared with 2nd protection degree.

SKUEV0279 Šúr is sufficiently far from the proposed route of highway D4.
SKCHVU014 Little Carpathians touches the portal part of the tunnel route of highway D4 in further section.

III.6.8 Territorial system of ecological stability

Territorial system of ecological stability represents such space-wide structure of the interconnected systems, their components and elements, which ensures the diversity of conditions and forms of life in the country and creates conditions for maintaining and improving the ecological stability of the landscape and the human environment. The basis of this system consists of bio-centres and bio-corridors at various hierarchical levels.

Supraregional level

In the vicinity of the proposed structure there is a supraregional biocentre (SRBC) 116 Šúr (including NNR Šúr) interconnected with hydrologic supraregional biocorridor (SRBK) 23 leading concurrently with watercourses Small Danube and Šúrsky channel. SRBC 115 Martinský les is located in the north-eastern part of the territory.

Regional level

North of the Bratislava – Rača municipality, south eastern slopes of Little Carpathians there is a regional biocentre RBC 7 Vajnorská dolina and the related regional biocorridor RBK XVIII Potok Strúha. It is connected with the regional biocentre RBC 28 Šprinclov Majer composed of water and wetland communities. Small biocentres of regional importance are recorded in the cadastre of Pezinok west of Grinava (a part of Pezinok), and sites Nad Jurom and Gaštanica in the cadastre of Svätý Jur. The

regional biocorridors also include Fofovský and Fanglovský potok (creeks) and biocorridor Duby located between the two creeks. The ecotone biocorridor between the forests and vineyards at eastern slopes in the cadastre of Svätý Jur municipality is also recorded as a regional biocorridor. South of Rača municipality, between the border of PLA Little Carpathians towards Vajnory municipality, there is regional biocorridor RBC XVII Račiansky potok including its tributaries. It is connected to the regional biocorridor RBC Šúrsky channel, which runs along the north-western and south-western border of SRBC 116 Šúr. Another significant biocorridor is RBC Čierna voda, bordered by highway D1 which continues up to the conflux with Small Danube.

Local level

In the greater surrounding of the proposed structure there are several components of the local TSES. Their route and names are taken from the land-use plans of the municipalities concerned and divided based on the cadastral territories.

Svätý Jur cadastral territory

At the local level the TSES in the cadastral territory of the municipality and in the vicinity of the proposed variants include Júrsky potok (it has potential to function as the biocorridor in the built-up area), biocentres Háj (surrounding the pond at the junction of Šúrsky channel and Strúha creek, important floristic location), Myší vrch and Kamenný kopec at Javorník creek (Račí potok), as an important avifauna site and other small biocentres in the vineyards: biocentre Dubníky is composed of vineyards and gardens, Kulky representing refuge for animals composed of the woods and shrub vegetation, similar refuge in the biocentres Strapáky – Krajčíre, Panciere, and Pitvory. Neštich hradisko is an important floristic site as well as the Biely Kameň nad Neštichom site.

III.7 Residents

The proposed highway D4 in the section Ivanka North – Rača is situated at the edge of the Capital City SR Bratislava, its municipalities of Vajnory, Rača, Svätý Jur, Ivanka pri Dunaji. Bratislava, as the capital city, is the administrative centre. 428 791 residents with permanent residence live in its territory with acreage of 367.7 km^2. The suburban area of the capital city forms Bratislava region, where another approx. 190,000 residents live. The number of people present in the city during the day increased by 40 %. It results from the fact that people travel to work, school, for tourism purposes and from the fact that Bratislava is the administrative and economic centre and the destination of the transit transport. From the viewpoint of the administrative arrangement, the Vajnory and Rača municipalities are included in District of Bratislava III, Svätý Jur is a part of District of Pezinok, Ivanka pri Dunaji belongs to District of Senec.

Certain statistical indicators:

data of the Statistical Office as at 31 December 2012:	Bratislava	BA - Rača	BA - Vajnory	Sv. Jur	Ivanka pri Dunaji
Population	415,589	20,068	5,268	5,317	6,011
Population density per 1 km^2	1,130	848	389	133	422
Pre-productive age	55,607	2565	791	871	999
Productive age	247,476	11,508	3,216	3,226	3,478
Post-productive age	112,506	5,995	1,261	1,220	1,534
Total live births	5,088	235	53	77	68
Total deceased	4,050	215	43	49	60
Natural increase, decrease (-)	1,038	20	10	28	8
Total increase, decrease (-)	2,397	254	138	88	77

III.8 Services and Tourism

In Bratislava region, in particular in Bratislava, here is a dense network of internal trade facilities, hotels and restaurants serving the needs of tourism and recreation. In addition to trade the transformation process of the economy expanded tertiary sector by number of entities offering different kinds of market services. There is the largest number of higher education institutions in the Slovak Republic. The most of the students in the region were enrolled at the Comenius University, Slovak University of Technology and University of Economics. In the field of culture there is a two hundred year long tradition of

stagecraft bound to the Capital City of the Slovak Republic Bratislava. The Slovak National Theatre has an international reputation with drama, opera and ballet scenes. Musical life is represented by the Slovak Philharmonic with Bratislava Music Festival and the genre diversity is complemented by other music festivals. There is a number of museums and galleries. The most exhibits and exhibitions are presented by the Slovak National Museum and Slovak National Gallery. In the region the healthcare services are provided by the network of facilities, most of which is in Bratislava, a highly specialized hospitals, specialized medical centres, and specialized rehabilitation facilities that provide medical care with nationwide coverage. The nature in the vicinity of the city provides a number of potential uses for purposes of recreation on a daily, weekend and holidays and the summer and winter basis. From this perspective, particularly attractive are Little Carpathians with hiking trails, biking trails, ski slopes, cottage settlement. The Danube river together with its branches and floodplain forests provide opportunities for water sports, fishing as well as cycling trails and hiking trails.

III.9 Archaeological sites

According to the archaeological survey prepared by the archaeological institute in Nitra (Elschek, 2013) the territory affected by the construction of highway D4 in section Ivanka North – Rača has been suitable for settlement since the prehistoric times. This geographic space was settled particularly due to fertile soil, numerous rivers, most important of which was Čierna voda with tributaries from the slopes of the Little Carpathians. Settlements were located on terraces near watercourses where the settlements were concentrated in the territory of the structure and its immediate surroundings from prehistoric times to date.
The oldest settlement in the geographical area began in the Neolithic Age which is confirmed by the collected material from this territory. Other findings from the Bronze Age, from the earlier Iron Age - Hallstatt and La Tene Iron Age, the holders of which were the Celts in the middle Danube.
The Bratislava territory and wider surroundings played an important role also in Roman times. The Danube became the Roman border at the turn of new era and had considerable military-strategic importance after four centuries AD. The Danube River forms a bridge between the ancient world and the Danube Barbaricum as evidenced by the numerous Roman findings from the territory concerned, which were delivered to this territory due to the Romans trading with Germans.
The settlements were intensively established in the period of migrating nations but particularly at the time when the first Slavic groups arrived to Slovakia in 6th century, the territory considerably flourishes at the time of the Great Moravian Empire in the 9th century and in the Middle Ages.

The following archaeological site is recorded in the route of D4 Bratislava, Ivanka North – Rača:
Location 7 : Ivanka pri Dunaji, Vajnory, Svätý Júr, positions Vlčí klin and Háj
Type of location: Settlement large agglomerations with production buildings
Dating: Prehistory, Roman Period, Slavic period to the Middle Ages
Findings: Housing estate and manufacturing objects from prehistory to the Middle Ages and iron furnace from the Roman period.
Findings: ceramic, small finds, animal bones, iron slag.

Construction activities often result in damage or total destruction of archaeological sites protected by Act No. 49/2002 Coll. on Heritage Protection, as amended. In order to avoid liquidation and loss of national cultural heritage sites, it is required that the sites be documented and examined in the course of rescue archaeological research.

III.10 Land-use planning documentation

Status of the land-use planning documentation at the time of preparing the Assessment Report
The following land-use planning documentations apply to the territory crossed by the section of highway D4 :

In the land-use plan of Bratislava self-governing region, consolidated version under amendments dated 2000, 2002, 1/2003, 01/2005 (made by AUREX, s.r.o., 2008) the following is stated with regard to highway D4:
- D4 Bratislava Jarovce municipality – borders with the Republic of Austria,

Reserve the territory for the prospective option of extending the zero radial road around Bratislava from the interchange with the highway D2 south of Stupava towards the state border with Austria for the economic development of the area.

Land-use plan of the Capital City of SR Bratislava – approved on 31 May 2007
– prepared by Ing. Arch. Oľga Vránková (text), Ing. Arch. Tatjana Čechová (graphic design)
– ***Changes and amendments 01*** – effective from 15 January 2009
– in the area of the superior traffic infrastructure it prescribes reserving the zero radial road around Bratislava from interchange D2 x D4 in Bratislava – Jarovce municipality and further towards new bridge over Danube, Rovinka, Most pri Bratislave, Ivanka pri Dunaji, Bratislava – Vajnory municipality, tunnel under Carpathians, Marianka, connection to D2 south of Stupava with prospective continuation north of Bratislava – Devínska Nová Ves municipality concurrently with railway bridge over Morava river towards the state border with Austria
– the route of highway D4 in the land-use plan of Bratislava City reflects, in the section between the interchanges Ivanka North and Záhorská Bystrica, the assessed variants 2a and/or 2b in the corridor, which was taken into consideration in implementing the zero radial road

Svätý Jur
– Land-use plan of Svätý Jur – made by Architektonický ateliér BP (architectural studio), Ing. Arch. Bohuslav Pernecký, approved on 7 September 2004
– Changes and amendments 1 – made by Architektonický ateliér BP (architectural studio), Ing. Arch. Bohuslav Pernecký, February 2004
– Changes and amendments 2 – made by Architektonický ateliér (architectural studio),Arch. Miriam Šebianová, Ing. Arch. Marek Poliačik, June 2004
– the route of highway D4 in the land-use plan of Bratislava City reflects, in the section between the interchanges Ivanka North and Záhorská Bystrica, the assessed variants 2a and/or 2b, variants 7a, 7b, 7c are situated northerly in the section from FOI Rača to the eastern portal of the Karpaty tunnel

Ivanka pri Dunaji
– the municipality is located south-east of the proposed route, close to FOI Ivanka North
– land-use plan of Ivanka pri Dunaji – prepared by Ing. Arch. Hana Hlubocká et al., 1998
– Changes and amendments 01/2006 - made by AŽ Projekt Bratislava, Ing. Mária Krumpolcová, approved on 5 February 2007
– the route of highway D4 in variants 2a, 2b, 7a, 7b, 7c, is in line with land use plan of the municipality
– it is proposed that the corridor be reserved for the route of the zero raial road around Bratislava between the airport and Šúrsky channel

Current status of the land-use planning documentation (2014)
Resolution No. 60/2013 dated 20 September 2013 approved the Land-Use Plan of Bratislava Self-Governing Region, and the Generally Binding Regulation of Bratislava Self-Governing Region No. 1/2013 dated 20 September 2013, declaring the binding part of the Land-Use Plan of Bratislava Self-Governing Region. This repealed the preceding LUP of Bratislava self-governing region, as amended in 2008. Drawing of public transport routes includes the route of highway D4 in a position recommended by final statement of the Ministry of Environment SR 292/2011-3.4/ml dated 7 February 2012 to Assessment Report concerning structure D4 Ivanka North – Záhorská Bystrica.

Land-use plan of the Capital City of SR Bratislava
– ***Changes and amendments 02*** prepared by Department of Land-Use Planning and Development of the City Council of Bratislava in 2010.
The most fundamental change in the field of highways and expressways is the implementation of the current layout of the network of highways and expressways in the Slovak Republic in the Land-Use Plan of the upper tier territorial unit of Bratislava Region, as amended, and Government Resolution No. 882 date 3 December 2008 in LUP of the Capital City of SR Bratislava. It concerns a zero radial road in the section from the border with Austria (Kittsee) to the border with Austria (Marchegg) with parameters of a highway entitled D4 and the inclusion of R7 Lučenec - Bratislava up to highway D4 in the network of expressways of the Slovak Republic.
Highway D4 (zero radial road running from the highway intechange D2 / D4 in Jarovce municipality, through a new bridge over the Danube, along the southern and eastern boundaries of the city up to highway D1 and continuing on the Račianska radial road, including flyover interchanges with r. I / 2, extended Bajkalská r. I / 63, r. II / 572, r. I / 61, D1, r. III / 0611, r. II / 502)

Proposal of the road network for 2030 - extension of the route of highway D4 (zero radial road running from Račianska radial road, through the tunnel in the Carpathians up to the state border with Austria (Marchegg).

- Changes and amendments *3 – Proposal 07/2013 (City Council of the Capital City)* - it concerns the first phase of changes to the valid land-use plan of the Capital City SR Bratislava, which includes the draft changes to the LUP in the site of Kráľova hora and changes to the Main public transport system - tram route Jantárova cesta – Štúrova ulica The changes do not relate to the position of highway D4.

Svätý Jur
In 2012 new Changes and amendments No.1/2012 were adopted – Chlebnice, (Ing.arch. Milan Zelina), the documentation does not deal with the position of highway D4.

Ivanka pri Dunaji
Proposal -Changes and Amendments No. 1/2013 (Ing.arch. Monika Dudášová) changing and amending LUP CA Ivanka pri Dunaji as amended by ZaD, approved by resolution of CA in Ivanka pri Dunaji No. 3/1998, author: Ing. Arch. Hana Hlubocká et al.
- no changes in the land-use plan with regard to the position of highway D4
- deals with adding new collecting road FT B3 (3rd class road), running in the south-east edge of the cadastral territory of the municipality. Road dealt with in three stages, presumes interconnection of roads III/061066 and III/061004, as well as future connection to highway D4;

- in August 2013 District Environmental Office in Senec issued the Decision based on the fact finding concerning the strategy document

Vajnory
Urban Study of Nemecká dolina in municipality Bratislava Vajnory (AZ ateliér s.r.o. Bratislava, 12/2010), the proposed structure does not collide with the planned investments in the territory.

IV. IMPACT ON THE ENVIRONMENT AND HUMAN HEALTH INCLUDING CUMULATIVE AND SYNERGISTIC

IV.1 Changes in location of highway D4

The following changes occurred during preparation of the LUPD when compared to the solution specified in the Assessment Report:

1. Location of highway D4 in the position under Technical Study "Highway D4 Bratislava, 15.0 km point, interchange Ivanka North – Rača Interchange", where the distance from Lysec lake was increased in line with the recommendations of the Final Opinion of the Ministry of Environment SR (EIA),

2. Change in the height of the route of highway D4 at FOI "Ivanka – North" under the conclusions from the elaborated analysis (D1/D4) and Technical Study "Highway D4 Bratislava, 15.0 km point, interchange Ivanka North – Rača Interchange" prepared on the basis of requirements and recommendations of the Final Opinion of the Ministry of Environment SR (EIA), running under the level of highway D1, by bridge over Vajnorský potok (creek) (underpass height h=4,20 m under the bridge), in the vicinity of the existing built-up area of Vajnory on the low embankment over the level of the current terrain, bridge over Račiansky potok (creek) (underpass height h=4,20 m under the bridge), at point 3.300 km of D4 on the low embankment over the level of the current terrain, continued by bridge over railway Bratislava – Žilina and over road II/502,

All aforementioned changes are based on the recommendations of the Ministry of Environment SR in the final statement, regarding more precise description of the route, which occurred in the process of preparing the highway project on the basis of precise terrain orientation or in order to comply with the requirements of the entities and municipalities concerned.

A) Data about direct and indirect impacts on the environment and human health including cumulative and synergistic

In LUPD the route of the highway was adjusted so that it does not interfere with the riparian overgrowth of Lysec lake. The value of the site from ornithological viewpoint lies mainly in the water area and the remnants of the floodplain forest located in the immediate vicinity of the lake. This creates a significant

potential breeding habitat for several species of water and cavity birds. Site should be as far as possible preserved as irreplaceable bio-centre in the surrounding landscape.
The height of the vertical alignment of the highway was adjusted in order to eliminate the noise burden for Vajnory to the maximum extent possible. The change in the height will have a positive impact on the landscape (by excluding construction of originally planned 16 m high embankments) and on the economic issues.

Element of the environment	**Characteristics of impact**	**Comparing the impacts of the proposed changes to the impact identified in the initial assessment of solutions**
air	*burden of emissions, dust*	comparable impact
surrounding rock	*disrupted stability*	comparable impact
groundwater	*contamination risk*	comparable impact
surface water	*contamination risk*	comparable impact
soil	*permanent and temporary land taking*	slightly greater impact
biota, Natura 2000	*interference with habitats, felling of trees, stress factors,*	favourable impact
territorial system of ecological stability	*interference with TSES structure, barrier effect*	favourable impact
impact on traffic	*improved traffic situation*	favourable impact
comfort and quality of life	*-impact of emissions and noise on residents* *- increased traffic safety*	improved quality of environment in Vajnory

B)

C) Data on expected impacts of the proposed activity on the protected areas

Change to the proposed work is located in the territory to which the 1st protection level applies under Act of the National Council SR No. 543/2002 Coll. on Protection of Nature and Landscape. No significant negative impact on NNR Šúr is anticipated during implementation of the protective measures (noise barriers, wildlife crossing).

IV.2 Changes in the interchanges

IV.2.1 FOI "Čierna voda" (structure 102-00)

Change in the position and shape of FOI "Čierna voda" results from current prospective traffic data and creation of opportunity of future connection of new urbanised area of Vajnory directly to FOI "Čierna voda". The proposed change will also contribute to unburden the traffic and thus avoiding the burdening of built-up area of Old Vajnory by noise and emissions from transport in newly urbanised area. In Vajnory area the conditions for collision free cycling trail with road III/5021 will be created.

A) Data about direct and indirect impacts on the environment and human health including cumulative and synergistic

The structure concerned required permanent and temporary land taking of the agricultural land. Since the EIA did not include calculation of land to be taken by the interchange, we can state based on the professional estimate that the acreage of taken land will be considerable. The originally proposed interchange and the change to the proposed work do not interfere with the stands of trees growing outside the forest or in protected habitats. No other significant differences were identified.

The new branches of the interchange will contribute to unburdening Vajnory, resulting in the improvement of environmental quality in the municipality (decreased production of air pollutants, reduced noise burden, reduced vibrations, increased pedestrian safety and increased traffic safety).

The table below shows characteristics of the most significant potential impacts of the change to the proposed works.

Element of the environment	Characteristics of impact	Comparing the impacts of the proposed changes to the impact identified in the initial assessment of solutions
air	*burden of emissions, dust*	comparable impact
surrounding rock	*risk of landslides, contamination*	comparable impact
groundwater	*contamination risk*	comparable impact
surface water	*contamination risk*	comparable impact
soil	*permanent and temporary land taking*	greater impact
biota, Natura 2000	*interference with habitats, felling trees, stress factors, close to SPA and SCI*	comparable impact
territorial system of ecological stability	*intervention in TSES structure barrier effect*	comparable impact
impact on traffic	*change in traffic situation*	improved traffic situation
comfort and quality of life	*impact of emissions and noise on residents* *increased traffic safety*	improved quality of environment in Vajnory municipality

B) Data on expected impacts of the proposed activity on the protected areas

Change to the proposed work is located in the territory to which the 1st protection level applies under Act of the National Council SR No. 543/2002 Coll. on Protection of Nature and Landscape and does not constitute interference with the territory declared or proposed for protection under national and European protected Natura 2000 sites.

IV.2.2 FOI "Rača" (structure 103-00)

Change in the shape of FOI "Rača" in line with the recommendation specified in the Assessment Report (EIA), lower construction costs, lower number of bridge structures, no need of walls, less technically challenging bridge structures over modernised railway line Bratislava - Žilina (minimum restrictions to railway transport) without affecting the overhead 400 kV EHV lines, creates space for the implementation of the plan of ZSE-D, a.s. and SEPS, š.p. to build the substation Tr 400/110/22 kV Vajnory, half of road II/502 maintains at the current position, the option of turning around at FOI "Rača".

Data about direct and indirect impacts on the environment and human health including cumulative and synergistic

The structure concerned will require a comparable interference with the vineyards on the western slopes of the Little Carpathians. A positive change in the shape of the interchange is the fact that the structure will be further away from NNR Šúr. No other significant differences were identified.

The table below shows characteristics of the most significant potential impacts of the change to the proposed works.

Element of the environment	Characteristics of impact	Comparing the impacts of the proposed changes to the impact identified in the initial assessment of solutions
air	*burden of emissions, dust*	comparable impact
surrounding rock	*risk of landslides, contamination*	comparable impact
groundwater	*contamination risk*	comparable impact

Element of the environment	Characteristics of impact	Comparing the impacts of the proposed changes to the impact identified in the initial assessment of solutions
surface water	*contamination risk*	comparable impact
soil	*permanent and temporary land taking*	comparable impact
biota	*felling of trees, stress factors*	comparable impact
territorial system of ecological stability	*intervention in TSES structure barrier effect*	comparable impact
impact on traffic	*change in traffic situation*	improved traffic situation
comfort and quality of life	*impact of emissions and noise on residents* *increased traffic safety*	improved quality of environment

A) Data on expected impacts of the proposed activity on the protected areas

Change to the proposed work is located in the territory to which the 1st protection level applies under Act of the National Council SR No. 543/2002 Coll. on Protection of Nature and Landscape and does not constitute interference with the territory declared or proposed for protection under national and European protected Natura 2000 sites.

IV.3 Relocation and reconstruction of the road

IV.3.1 Relocation of road III/5021 at 1.363 km of D4 in interchange "Čierna voda", 1,274.18 m long (structure 111-00)

Change in situated relocation of road II/5021 due to change in solution of FOI "Čierna voda" and height of route D4, no need to destruct and build new bridge on r.III/5021 over Šurský channel.

Characteristics of the impact of the proposed change
The structure of road relocation represents an increase in agricultural land compared to the Assessment Report. The impact of construction on the environment due to its size and location is assessed as moderate.

IV.3.2 Relocation of local road at 3.810 km of D4 to NNR Šúr, 662.12m long (structure 113-00)

Relocation of local road at 3.810 km of D4 to NNR Šúr, categ. 2L 4/30, 662.12m long.Detailed description of position and length with regard to existing gas pipeline VTL.

Characteristics of the impact of the proposed change
The proposed change compared to the structure proposed in the Assessment Report represents a comparable impact on the environment.

IV.3.3 Relocation of road II/502 at 4.183 km of D4 in cadastral territory Svätý Jur, 3,359.73 m long (structure 115-01)

Change in the position and scope of relocation in the cadastral territory of Sv. Jur due to change in the shape of FOI "Rača"
The structure of road relocation represents an increase in agricultural land - vineyards compared to the Assessment Report. The impact of construction on the environment due to its size and location is assessed as moderate.

IV.3.4 Relocation of road II/502 at 4.183 km of D4 in cadastral territory Vajnory, 3,359.73 m long (structure 115-02)

Change in the position and scope of relocation in the cadastral territory of Sv. Jur due to change in the shape of FOI "Rača"
The structure of road relocation represents an increase in agricultural land - vineyards compared to the Assessment Report. The impact of construction on the environment due to its size and location is assessed as moderate.

IV.3.5 Relocation of field road at 4.400 km of D4 in cadastral territory Svätý Jur, 1336.62 m long (structure 116-01)

Change in the position and scope of relocationof field road in the cadastral territory of Sv. Jur due to change in the shape of FOI "Rača"

Characteristics of the impact of the proposed change
The structure of road relocation represents an increase in agricultural land - vineyards compared to the Assessment Report. The impact of construction on the environment due to its size and location is assessed as moderate.

IV.3.6 Relocation of field road at 4.400 km of D4 in cadastral territory Vajnory, 1336.62 m long (structure 116-02)

Change in the position and scope of relocation of field road in the cadastral territory of Vajnory due to change in the shape of FOI "Rača"

Characteristics of the impact of the proposed change
The structure of road relocation represents an increase in agricultural land - vineyards compared to the Assessment Report. The impact of construction on the environment due to its size and location is assessed as moderate.

IV.3.7 Bypass on road III/5021 at interchange "Čierna voda", 280 m long (structure 151-00)

Change in the extent due to change in the shape of FOI "Čierna voda".

Characteristics of the impact of the proposed change
This change will contribute to improvement of traffic conditions and to increase its safety. The impact of construction on the environment due to its size and location is assessed as negligible.

IV.4 Structures of relocations and reconstructions of roads proposed in LUPD not specified in Assessment Report (EIA).

IV.4.1 Local road at 1.600 - 2.300 km of D4, 760 m long (structure 112-01)

Local road at 1.600 - 2.300 km of D4, categ. MZ 9,5/50, 760 m long New structure in the cadastral territory Sv. Jur due to ensuring the option of connecting planned premises of CEPIT through FOI "Čierna voda" to highway D4

Characteristics of the impact of the proposed change
This change will contribute to improvement of traffic conditions. The change will be reflected in the increased acreage of agricultural land taking. The impact of construction on the environment due to its size and location is assessed as negligible.

IV.4.2 Local road at 2.300 - 2.400 km of D4, 173m long (structure 112-02)

categ. MZ 9,5/50 New structure in the cadastral territory Vajnory due to ensuring the option of connecting planned premises of CEPIT through FOI "Čierna voda" to highway D4

Characteristics of the impact of the proposed change
This change will contribute to improvement of traffic conditions. The change will be reflected in the increased acreage of agricultural land taking.
The structure at the bridging of Račiansky creek interferes with habitat**: Ls1.1 Willow-poplar lowland floodplain forests - priority habitats of Community importance**
The site comprises the refuge of the floodplain forest with the following species: *Cerasus avium (wild cherry), Phragmites australis (common reed), Populus nigra (black poplar), Populus x canescens (grey poplar), Swida sanguinea (common dogwood), Viscum album (European mistletoe).*
The total social value of the stock-taken habitat of Community importance covering an area of 1,072.3 m^2, in accordance with Act No. 543/2002 Coll. as amended, is EUR 19,215.62.
The impact of construction on the environment due to its size is assessed as moderate.

IV.4.3 Local road at 2.400 - 2.600 km of D4, 331m long (structure 112-03)

New structure in the cadastral territory Vajnory due to ensuring the option of connecting planned premises of CEPIT through FOI "Čierna voda" to highway D4

Characteristics of the impact of the proposed change
This change will contribute to improvement of traffic conditions. The change will be reflected in the increased acreage of agricultural land taking. The impact of construction on the environment due to its size and location is assessed as negligible.

IV.4.4 Relocation of field road at 0.590 km of D4, 803.50 m long (structure 114-00)

Relocation of the field road is to ensure access to the land divided by the structure.

Characteristics of the impact of the proposed change
This change will contribute to improvement of traffic conditions. The change will be reflected in the increased acreage of agricultural land taking. The impact of construction on the environment due to its size and location is assessed as negligible.

IV.4.5 Bypass on road II/502 in interchange "Rača" (structure 152-00)

New structure due to required redirecting of traffic during construction of FOI "Rača".

Characteristics of the impact of the proposed change
This change will contribute to improvement of traffic conditions and to increase its safety. The impact of construction on the environment due to its size and location is assessed as negligible.

IV.4.6 Modification of roads of 2nd and 3rd class roads (after completion of construction) (structure 153-00)

New structure of readjusted 2nd and 3rd class roads after completion of construction, if required even during construction of highway D4

Characteristics of the impact of the proposed change
This change will contribute to improvement of traffic conditions and to increase its safety. The impact of construction on the environment due to its size and location is assessed as negligible.

IV.5 Changes to bridge structures

Bridge structures are an essential part of the highway route, as well as integrated in some already above-mentioned structures, particularly in the structure of highway D4 and interchanges.

IV.5.1 Bridge on D4 at 0.580 km over Vajnorský potok (structure 201-00)

Change to location of the bridge, width and span of the bridge due to the change in position of D4 in greater distance from the Lysec lake, the requirement under ZS (EIA).

Characteristics of the impact of the proposed change
When compared to the Assessment Report the length of the bridge will be extended by 35.25 m which will contribute to improving the migration possibilities under the bridge. Change to the proposed work is located in the territory to which the 1st protection level applies and does not constitute interference with the territory declared or proposed for protection under national and European protected Natura 2000 sites.

IV.5.2 Bridge on collector at 0.484 km left of Struha creek (structure M2)

Cancelled, at the point of crossing the creek the collectors were removed, D4 is 6-lane.

Characteristics of the impact of the proposed change
No impact.

IV.5.3 Bridge on collector at 0.484 km left of Struha creek (structure M3)

Cancelled, at the point of crossing the creek the collectors were removed, D4 is 6-lane.

Characteristics of the impact of the proposed change
No impact.

IV.5.4 Bridge on r. III/5021 at 1.363 km over highway D4 (structure 202-00)

Change to location and span of the bridge due to change in FOI "Čierna voda".

Characteristics of the impact of the proposed change
When compared to the Assessment Report the length of the bridge will be extended by 23.19 m which will contribute to improving the migration possibilities under the bridge. Change to the proposed work is located in the territory to which the 1st protection level applies and does not constitute interference with the territory declared or proposed for protection under national and European protected Natura 2000 sites.

IV.5.5. Bridge on MK at 1.573 km over highway D4 in interchange "Čierna voda", (structure 203-00)

New structure due to change in the solution of FOI "Čierna voda".

Characteristics of the impact of the proposed change
This change is not in conflict with the declared protected areas or site in the European network of NATURA 2000. The proposed change represents a solution with minimal impact on the environment and health of residents.

IV.5.6. Wildlife crossing at 1.948 km of D4 (structure 204-01)

Change in the scope of overlay of the highway due to height of D4 on low embankment over surface water level and solution of FOI "Čierna voda" in line with conditions for verification in ZS (EIA).

Characteristics of the impact of the proposed change
Wildlife crossing at 1.948km of D4, 100m long, bridges the highway as an overlaid structure for transition over the highway and local road. The support structure will be overlaid by the soil and the surface will be grassed and modified by vegetation so as to create favourable conditions for migrating animals, which uses adjacent fields as feeding sites.

IV.5.7. Wildlife crossing at 1.948 km of D4 (structure 204-02)

Change in the scope of overlay of the highway due to height of D4 on low embankment over surface water level and solution of FOI "Čierna voda" in line with conditions for verification in ZS (EIA).

Characteristics of the impact of the proposed change
This change is not in conflict with the declared protected areas or site in the European network of NATURA 2000. The proposed change represents a solution with minimal effect on the environment and health of residents. When compared to the original proposal, it does not have a different nature and scope of impact than was anticipated in the Assessment Report.

IV.5.8. Bridge on D4 at 2.560 km over Račiansky potok (structure 205-00)

Change in the bridge span due to need to reduce thickness of the bridge. The length of the bridge structure will be increased by 30.47 m.

Characteristics of the impact of the proposed change
The bridge is 6.5 meters high so the space under bridge will be provide conditions for the migration of animals of category B (deer), category C (fox, otter, rabbit, marten) and category D (amphibians). When compared to the original proposal, the change to bridge will create favourable conditions for wildlife migration.

IV.5.9. Bridge on collector of D4 on the left over Račiansky potok (creek), (structure M7)

The bridge structure will not be constructed due to change in FOI "Rača".

Characteristics of the impact of the proposed change
No impact.

IV.5.10. Bridge on D4 at 3.810 km over local road in NNR Šúr, (structure 206-00)

More detailed specification of the position and length of the bridge in line with routing MK to NPR Šúr and change of FOI "Rača" (platform 41 is cancelled).

Characteristics of the impact of the proposed change
When compared to the original proposal, it does not have a different nature and scope of impact than was anticipated in the Assessment Report.

IV.5.11. Bridge on highway D4 through ramp of 41 FOI "Rača" (structure M9)

The bridge structure will not be constructed due to change in FOI "Rača".

Characteristics of the impact of the proposed change
No impact.

IV.5.12. Bridge on D4 at 4.160 km over railway ŽSR Bratislava - Žilina at 10.760 km of railway (structure 207-00)

Change in length of the bridge specified on the basis of a detailed geodetic survey and the proposed shape of FOI "Rača".

Characteristics of the impact of the proposed change
This change is not in conflict with the declared protected areas or site in the European network of NATURA 2000. The proposed change represents a solution with negligible to no impact on the environment and health of residents.

IV.5.13. Bridge on collector of D4 on the left over road II/502, railway and road at FOI Rača (structure M11)

The bridge structure will not be constructed due to change in FOI "Rača".

Characteristics of the impact of the proposed change
No impact.

IV.5.14. Bridge on highway D4 through ramp of 2 FOI "Rača" (structure M12)

The bridge structure will not be constructed due to change in FOI "Rača".

Characteristics of the impact of the proposed change
No impact.

IV.5.15. Bridge on collector of D4 on the left over platform 2 at FOI Rača (M13)

The bridge structure will not be constructed due to change in FOI "Rača".

Characteristics of the impact of the proposed change
No impact.

IV.5.16. Bridge on platform 12 at FOI Rača at 0.415 km through road II/502 (M14)

The bridge structure will not be constructed due to change in FOI "Rača".

Characteristics of the impact of the proposed change
No impact.

IV.5.17. Bridge on platform 2 at FOI Rača at 0.215 km over railway (structure M15)

The bridge structure will not be constructed due to change in FOI "Rača".

Characteristics of the impact of the proposed change
No impact.

IV.5.18. Bridge on platform 2 at FOI Rača at km over railway and road II/502 (M16)

The bridge structure will not be constructed due to change in FOI "Rača".

Characteristics of the impact of the proposed change
No impact.

IV.5.19. Bridge on platform 41 at FOI Rača at 0.298 km over railway and road II/502 (structure M17)

The bridge structure will not be constructed due to change in FOI "Rača".

Characteristics of the impact of the proposed change
No impact.

IV.5.20. Bridge on platform 5 at FOI Rača at 0.445 km over railway (structure M18)

The bridge structure will not be constructed due to change in FOI "Rača".

Characteristics of the impact of the proposed change
No impact.

IV.5.21. Bridge on "BS" branch at interchange "Rača“ over relocation of road II/502 (structure 208-00)

Construction of new bridge structure required a change in shape of FOI "Rača".

Characteristics of the impact of the proposed change
This change is not in conflict with the declared protected areas or site in the European network of NATURA 2000. The proposed change represents a solution with negligible to no impact on the environment and health of residents.

IV.5.22. Bridge on "SB" branch at interchange "Rača“ over relocation of road II/50 (structure 209-00)

Construction of new bridge structure required a change in shape of FOI "Rača".

Characteristics of the impact of the proposed change
This change is not in conflict with the declared protected areas or site in the European network of NATURA 2000. The proposed change represents a solution with minimal impact on the environment and health of residents.

IV.5.23. Bridge on LR at 2.300 km over Vajnorský potok (structure 210-00)

Construction of new bridge structure required a change in shape of FOI "Rača".

Characteristics of the impact of the proposed change
This change is not in conflict with the declared protected areas or site in the European network of NATURA 2000. The proposed change represents a solution with minimal effect on the environment and health of residents.

IV.5.24. Bridge on LR at 2.600 km over Račiansky potok (structure 211-00)

Construction of new bridge structure required a change in shape of FOI "Rača".
Characteristics of the impact of the proposed change
The structure will require intervention in the habitat of Community importance **Ls1.1 Willow-poplar lowland floodplain forests - priority habitats of Community importance**. Interference with the habitat requires the consent of the competent nature conservation authority. Given its scope the proposed change represents a solution with a slightly negative impact on the environment.

IV.6 Changes in structures of relocations and adjustments of watercourses

Solution under review (Plan)	Change in the proposed solution		Characteristics of the change to the proposed work
	structure	DCP	

Solution under review (Plan)	Change in the proposed solution		Characteristics of the change to the proposed work
	structure	DCP	
The Assessment Report does not specify any adjustments to watercourses	320	Adjustment of Račí potok (creek) at interchange "Rača", 189 m long	Shifting waters of Račí potok at the point of its crossing with branches of FOI "Rača"
	321	Adjustment of an unnamed creek at interchange "Rača", 212.12 m long	Shifting waters of the unnamed creek at the point of its crossing with branches of FOI "Rača"

The Assessment Report, based on the Technical Study, did not consider modification of the watercourses. More detailed elaboration of project documentation showed the necessity of diverting rivers.

IV.6.1 Adjustment of Račí potok (creek) at interchange "Rača", 189 m long (structure 320-00)

Shifting waters of Račí potok at the point of its crossing with branches of FOI "Rača". Modification in the length of 189 m will be led through culverts (63m and 16m). In the open riverbed the modification of the riverbed will be created by four arcs of four straight sections.

Characteristics of the impact of the proposed change
The most significant negative impact of the proposed work will be reflected in the construction phase on aquatic fauna of Račí potok. This impact will be temporary. In the operational phase a part of a watercourse will be conducted in a closed profile. Loss of light and change to temperature conditions will also negatively affect aquatic fauna. The proposed change will have a slightly negative impact.

IV.6.2 Adjustment of unnamed creek at interchange "Rača" (structure 321-00)

Shifting waters of the unnamed creek at the point of its crossing with branches of FOI "Rača".
Modification in the length of 212.12 m will be led through culverts (12m, 32.95m a 18m). In the open riverbed the modification of the riverbed will be created by two arcs of three straight sections.

Characteristics of the impact of the proposed change
The negative effects of the proposed changes will have similar negative effects as with regard to the structure 320-00.
The proposed change will have a slightly negative impact.

IV.7 Changes to the relocations of utilities

In the route of the proposed structure there are currently many utilities, lines and other facilities located in the entire section of highway D4 and related roads. In the points of intersection with the traffic corridors they are considerably accumulated.

During preparation of land-use planning documentation (LUPD) the scope of relocating the utilities was updated with regard to Assessment Report (EIA) for the following reasons:

- Detailed geodetic survey of the existing status along with setting the utilities during preparation of LUPD.
- The need to incorporate the comments and requirements of the administrators of the utilities concerned (opinions during preparation of LUPD).
- Detailed specification how to deal with the relocations due to need of coordinating them with other facilities related to the structure in question.

The following construction facilities and relocation of the operating sets of the utilities and new utilities were proposed in LUPD:

Sewerage, water supply, irrigation and drainage
501 Drainage of highway D4
502 Relocation of pressure sewerage DN250
510 Adjustment of water supply system DN 400 at 1.291 km of D4

511 Relocation of water supply pipeline DN 500
520 Relocation of irrigation pipeline DN 600 at 1.225 - 2.540 km of D4
521 Relocation of irrigation pipelines DN 250 at 0.000 - 2.350 km of D4
522 Adjustment of drainage in the cadastral territory Vajnory
523 Adjustment of drainage in the cadastral territory Svätý Jur

Facilities with power lines of VHV, HV, LV, VO
601 Relocation of overhead line VHV 110 kV l.No. 8708, 8710 at 4.020 km of D4
611 Relocation of overhead line HV 22 kV l.No. 210, 1106 at 1.200 km of D4
612 Relocation of overhead line HV 22 kV l.No. 210, 263 at 3.450 km of D4
613 Relocation of overhead line LV at 3.830 km of D4
614 Relocation of overhead line HV 22 kV l.No. 139, at 4.046 km of D4
615 Relocation of overhead line HV l.No. 1015, at 4.060 km of D4
616 Cable line HV 22kV from TS10, interchange D1-D4 - TS12 Rača
617 Connection of VO D4 at 0.000-1.140 km
620 LV connection line for ISD at 0.350 km of D4
621 LV connection for VO of highway D4 at interchange "Čierna voda"
622 LV connection for VO of road III/5021 at interchange "Čierna voda"
623 LV connection line for wildlife crossing at 1.950 km of D4
624 LV connection line for ISD at 4.240 km of D4
625 LV connection for VO of highway D4 at interchange "Rača"
626-01 LV connection for VO of road II/502 at interchange "Rača" in cadastral territory Svätý Jur
626-02 LV connection for VO of road II/502 at interchange "Rača" in cadastral territory Vajnory
627 Kiosk transformer station TS11 at interchange "Čierna Voda"
628 Kiosk transformer station TS12 at interchange "Rača"
630 Public lighting of D4 at interchange "Ivanka-North" at 0.000 - 1.140 km
631 Public lighting of D4 at interchange "Čierna Voda"
632 Public lighting of road III /5021 at interchange "Čierna Voda"
633 Public lighting for wildlife crossing at 1.950 km of D4
634-01 Public lighting of the local road at 1.600-2.300 km of D4
634-02 Public lighting of the local road at 2.300-2.600 km of D4
635 Public lighting of D4 at interchange "Rača"
636-01 Public lighting of road II/502 at 4,183 km of D4 in cadastral territory Svätý Jur
636-02 Public lighting of road II/502 at 4,183 km of D4 in cadastral territory Vajnory
637-01 LV connection line for VO of the local road at 1.600-2.300 km of D4
637-02 LV connection line for VO of the local road at 2.300-2.600 km of D4

Lines of ŽSR
651 Temporary adjustment of contact line at 10.760 rkm (4.136 km of D4)
661 Relocation of DK ŽSR at 4.105 km of D4

Gas pipelines
701 Adjustment of gas pipeline VTL DN 200 at 3.811 km of D4

Communication lines
751 Relocation of DK cables of SLOVAK TELEKOM at 1.290 km of D4
752 Relocation of MOK cables of SLOVAK TELEKOM at 1.290 km of D4
753 Relocation of DK cables of SLOVAK TELEKOM at interchange "Čierna voda"
754 Relocation of DK cables of SLOVAK TELEKOM at 1.300 -2.900 km of D4
755 Relocation of DK cables of SLOVAK TELEKOM at 3.320 -3.470 km of D4
756 Relocation of DK cables of SLOVAK TELEKOM at 3.400 km of D4
757 Relocation of overhead tf. lines of SLOVAK TELEKOM at 3.400 km of D4
758 Protection of DOK cables of SLOVAK TELEKOM at 4.170 km of D4
759 Protection of DK cables of SLOVAK TELEKOM at 4.170 km of D4
760 Relocation of DOK cables of ORANGE at interchange "Rača"

Information system
791-01 Information system of D4 - construction part
792-01 Information system on existing road II/502 at interchange "Rača" – construction part

Operating sets
791-02 Information system of D4 - technological part
792-02 Information system on existing road II/502 at interchange "Rača" – technological part

Characteristics of the impact of the proposed change
The proposed relocations of the utilities and new utilities are located in the close vicinity of the proposed structure, they form its necessary part. These changes are not in conflict with the declared protected areas or site in the European network of NATURA 2000. The proposed changes represent the solution with negligible to no impact on the environment and health of residents.

IV.8 Changes in the noise control measures

During preparation of land-use planning documentation (LUPD) the scope of noise control measures was updated in the Noise Study, with regard to Assessment Report (EIA), based on the updated outlook traffic data a according to the Decree of the Ministry of Health SR, where the impact of the traffic on the existing built-up area after launching into operation.

At places where construction of the primary noise control measures would be inappropriate, or costly, the façade adjustments are proposed.

In LUPD the following noise control measures were proposed:

261 Noise barrier at 0.450 - 1.355 km of D4 on the right
262 Noise barrier at 0.400 - 1.650 km of D4 on the left
263 Noise barrier at 2.000 - 3.950 km of D4 on the right - protection of NNR Šúr
264 Noise barrier at 2.000 - 2.950 km of D4 on the left
265 Noise barrier at "VA-ST" branch on the right at interchange "Čierna voda"- protection of NNR Šúr
266 Noise barrier at "ST-VA" branch on the right at interchange "Čierna voda"
267 Noise barrier at "VA-CV1" branch on the left at interchange "Čierna voda"
268 Noise barrier at "VA-CV1" branch on the right at interchange "Čierna voda"
269 Noise barrier at "CV-VA" branch on the left at interchange "Čierna voda"
270 Noise barrier at "VA-CV2" branch on the right at interchange "Čierna voda"
281 Façade adjustments in Vajnory at 1.200 - 1.600 km of D4 on the left

Characteristics of the impact of the proposed change
In terms of protection of the population from adverse effects of noise the measures for noise control represent a significant positive impact. The positive effect of the proposed change will be protection against noise from traffic in NNR Šúr.

V. GENERAL FINAL SUMMARY

V.1 Basic data on the proposer

Národná diaľničná spoločnosť, a.s. Bratislava
Company ID: 35 919 001
Seat: Mlynské nivy 45
821 09 Bratislava

V.2 Name of change to the proposed works

Highway D4 Bratislava Ivanka North - Rača

V.2 Location of change to the proposed works

region: Bratislava
District: Bratislava III, Senec, Pezinok
Cadastral territory: Ivanka pri Dunaji, Vajnory, Svätý Jur,

V.4 Brief description of change to the proposed work

The change to the proposed work relates to the following:

- **changes in location of *highway D4,***
- ***changes in location and shape of interchanges,***
- **changes in positions and scope relocations and reconstruction of roads and created structures of relocations and reconstruction of roads that have not been addressed in the Assessment Report ,**
- **changes in bridge structures, resulting from changes in position of D1,**
- **modifications and relocation of watercourses that were not assessed in the Assessment Report,**
- **changes in the relocations of utilities, which resulted from a detailed geodetic survey, comments of network administrators and from coordination with other structures,**
- **changes in the scope and location of noise barriers,**

The proposed work was assessed under Annex No. 8 to Act No. 24/2006 Coll. on EIA. Area in the change to the proposed work is comparable to the area of the originally proposed variants.

V.5 Data about direct and indirect impacts on the environment and human health including cumulative and synergistic

Requirements for inputs of changes to proposed work

Changes to the proposed works will be reflected in larger acreage of taken land. According Stocktaking and Social Evaluation of Woods growing outside the forests in the route of the proposed highway D4 there are woods at 39 sites in the cadastres of Ivanka pri Dunaji, Svätý Jur a Vajnory municipalities.
During the stocktaking it was identified that woods grow as accompanying vegetation roads, watercourses, drainage ditches, trees along dikes Šúrsky channel, sparse landscaping greenery in agricultural land and a vineyard. During stocktaking a total of 883 pieces of trees and 47,690 m2 of bush vegetation were recorded. **Out of this number the consent of the Nature and Landscape Protection Authority is required for 355 pc of trees and 47,690 m^2 of bush vegetation, whose social value amounts to EUR 608,161.26.**

The Assessment Report on the impact of highway D4 in section Ivanka North – Záhorská Bystrica and its separate annex concerning the Impact on Favourable Status of the Habitats identified the habitats in the route of highway D4 at approx. 0.5 km, i.e. right after the interchange Ivanka North, at approx 2.5 km and approx. 4.7 km ahead of the tunnel portal. In this area at point of 0.5 km ("Na Lysom") there is a significant site with the body of water and remnants of the floodplain forest in its vicinity, which represent the nesting habitat for several species of water and cavity birds living by the water areas. The site has a much higher value as a habitat. Site should be as far as possible preserved as irreplaceable bio-centre in the surrounding landscape.
The habitat of European importance - Ls1 - Floodplain forests was identified in the site. The measures recommended shifting the route of the highway further from the lake, which was accepted by LUPD to the extent possible.
At 2.5 km there is a habitat of national importance - Lk10 – Vegetation of tall sedge – in the site this habitat is bound to littoral parts of the drainage channel.
At approx. 4.7 km, i.e. right ahead of the tunnel portal the following habitats were identified: habitat of Community importance – Ls5 – Beech and mixed beech forests and priority habitat of Community importance Br4 – Alpine rivers and their ligneous vegetation with grey willow.
LUP includes the annexes Stocktaking and Social Evaluation of Habitats of Community and National Importance. In the survey made in October 2013 the priority habitat of the Community importance was identified in one site, it concerns habitat **Ls1.1 Willow-poplar lowland floodplain forests - priority habitats of Community importance**, which is located at section 2.4 - 2.6 km of the planned access road where the Račiansky potok is bridged.
In the vicinity of the highway route at point of approx. 3.7 km there is a **habitat of protected species of national importance - Buschia lateriflora** (buttercup). The study of mitigation measures for the conservation of sites of this type particularly recommends protecting the water regime in the site, fencing of the site to prevent its impairment during the construction, during the construction allowing management of the site to the same extent as before, and finally not to place other structures near the site. Prior to construction it is necessary to verify in cooperation with the SNCA SR, RCOP in Bratislava

the presence of the species and, in the case of a positive finding to impose measures (protect the habitat by temporary fence on the side of the highway during its construction).

Under Act No. 117/2010 Coll. amending and supplementing Act No. 543/2002 Coll. on Protection of Nature and Landscape, as amended by Act No. 24/2006 Coll. on Environmental Impact Assessment amending other acts, as amended, Section 6, par. 2 if the Nature and Landscape Protection Authority in its statement under Section 9, par. 1 notices that if the works, for which the statement is issued, can damage or destroy the habitat of the Community importance or habitat of the national importance, such works require consent of the Environmental District Authority.

Assessment of outputs of change to the proposed works

The most significant changes to the proposed work include:

- construction of wildlife crossing – which creates more favourable conditions allowing migration of animals,
- diverting highway from Lysec lake - preserves more favourable conditions for a significant biocentre,
- construction of noise barriers - increases protection of NNR Šúr from the noise burden from highway D4.

According to the originally assessed scope of the proposed variants the remaining outcomes remain the same when compared to change in the proposed work (air pollution, waste).

Health risk assessment

Proposed changes to the works create more favourable conditions for traffic safety on the highway D4 (creating conditions for safe migration of birds), as well as for improvement of the traffic situation in Vajnory (traffic safety and reduced noise and emission burden).

Comparison of the predicted environmental impacts

Change to the proposed work does not represent a significant change to the design solution. The most significant changes are changes in the location (shift) of the highway, placement and shape of interchanges in the relocations of water courses adjustments, extended scope of noise barriers. Impact on the residents and the natural environment will therefore be essentially comparable with the originally assessed scope of the solution according to variants.
Stocktaking of woods and habitats was performed.

Construction phase - the expected impacts on the residents

The structure will be built under the construction permit. The permit will reflect all conditions for construction so as to meet all applicable legislative conditions aimed at eliminating negative impacts on the residents.
In the construction phase the construction machinery will be used in the increased extent. The machinery will cause noise and air pollution by dustiness and fuels on a local basis and affect the territory and the residents.
Direct impacts and risks will be born only by the employees directly participating in the construction works.

Construction phase - the expected impacts on the environment

Based on Stocktaking of Woods and Stocktaking and Social Evaluation of Habitats of Community and National Importance, the competent authorities will issue the consents and requirements for felling trees and intervention in the habitats, which must be complied with.
During the construction the short-term source of air pollution will be dustiness caused by the construction works and construction machinery. However, this impact will be limited to the construction site. These impacts will not be as intensive so that they could intervene in the environment outside the construction site.
The territory lies mostly in the land with intensive human activities in contact with the existing major communication corridors.
It can be stated that the vegetation greatly influenced by human activity will be replaced by the implementation of the landscaping vegetation on the slopes of highways and in interchange areas. New type of vegetation is rich in species but composed of indigenous species of trees and shrubs.
Protected areas of nature under the law, sites of Community importance and protected bird areas are not within immediate reach of construction activities associated with the implementation of the proposed investment.

Operation phase - the expected impacts on the residents

From the viewpoint of residents the implementation of the plan can be assessed positively, as it will improve traffic conditions in the territory and significantly increase traffic safety and safety of the residents. Thanks to the vegetation the technical work will be incorporated in the landscape, which will have a positive impact on the landscape scenery.

The crucial possible negative effect of the operation on the residents is indirect through air and noise pollution caused by cars. Elimination of noise affecting the residents was verified by noise study and design of noise barrier walls.

Management of waste from the operation of the highway will be ensured by the highway administrator in cooperation with operators of waste recovery and disposal facilities on a contract basis. If the principles of safe and efficient waste management under the existing legislation are complied with, no negative impacts are expected.

Operation phase - the expected impacts on the environment

Impact on Air and Local Climate

Operation of the proposed changes will be a source of air pollution. It can be assumed that the impact on the air and the local climate will be only local, comparable with the scope identified in the Assessment Report.

Impacts on surface and ground waters

From the perspective of water resources, the implementation of the plan foresees no considerable intervention in qualitative or quantitative parameters.

Impact on gene pool and biodiversity

The corridor of the highway does not interfere with any protected area. The 1st protection level applies to the territory concerned under Act No. 543/2002 Coll.

If the requirements of SNCA SR are complied with, the change in the proposed work will considerably improve the conditions for migration of the animals in the routes of the migratory corridors.

The anticipated direct impacts on protected areas can be assessed as acceptable subject to compliance with legal standards in the field of air protection, water protection, noise burden and waste management.

Impacts on landscape

The current structure of the landscape in the territory concerned represents a strongly anthropogenically modified landscape. Implementation of the project will affect the nature of the territory concerned. Implementation of the project will affect the structure of the landscape. The construction increases the ratio of traffic in the territory to the detriment of agricultural land and other land. By planting vegetation on the slopes of the highway the technical work will be integrated into the landscape.

Operation of the proposed change will have no impact on the landscape as such.

CONCLUSION

Impacts on the environment and health of the residents identified in the Assessment Report can be viewed as comparable to the changes of the proposed work. Change to the proposed work will not constitute a material adverse impact on the environment and residents.

VI. ANNEXES

1. Final opinion (EIA) "Highway D4, Ivanka North - Záhorská Bystrica" (No. 292/2011-3.4/ml) dated 7 February 2012
2. Map in scale M 1:10000
3. Statement of the concerned public authority of nature and landscape protection
4. Opinion of the competent land-use planning authority
5. Land-Use Planning Documentation concerning "Highway D4 Bratislava, Ivanka North – Rača", prepared by "D4 Bratislava, Jarovce – Rača" Association in October 2013, on DVD

VII. DATE OF PREPARATION

Bratislava, May 2014

VIII. NAME, ADDRESS AND SIGNATURE OF THE AUTHOR OF THE NOTICE

Author: Ing. Ján Longa

DOPRAVOPROJEKT a.s.
Kominárska 2,4
832 03 Bratislava 3
Company ID No.: 31322000
Tel. 02/502 34 392
Fax: 02/502 34 555

. . . . . .

IX. SIGNATURE OF THE AUTHOR'S AUTHORISED REPRESENTATIVE

Authorized representative of the proposer: Ing. Pavol Kováčik, PhD., MBA
Investment Director and Vice-Chairman of the Board of Directors,
Národná diaľničná spoločnosť, a.s.
Mlynské nivy 45
821 09 Bratislava

. . . . . .

ANNEX No. 1

Final opinion of the Ministry of Environment SR on the Assessment Report concerning "Highway D4, Ivanka North - Záhorská Bystrica" was issued under No. 292/2011-3.4/ml dated 7 February 2012.

We do not attach the final opinion, it is available at website of the Ministry of Environment SR: http://enviroportal.sk/sk/eia

Disclaimer

This is an English translation of a document that was originally produced in the Slovak language. While we have exercised utmost care to make this translation accurate, it may contain typing or translation errors. Therefore, always consult the Slovak original before making decisions on the basis of this translation.

The name of this document in Slovak is *Oznámenie o zmene navrhovanej činnosti*. The file name has not been changed.

We hereby confirm that the European Bank for Reconstruction and Development shall have no responsibility for the translated content.

Project Implementation Services, spol. s r. o.
Consultant under Consultancy Contract C31934