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**ECONOMIC COMMISSION FOR EUROPE**

INLAND TRANSPORT COMMITTEE

Working Party on Customs Questions affecting Transport

Informal Ad hoc Expert Group on Conceptual and  
Technical aspects of Computerization of the TIR Procedure

Eleventh session  
Geneva, 29 January 2007  
Item 2 (b) of the provisional agenda

ACTIVITIES OF THE INFORMAL AD HOC EXPERT GROUP

Future Projects for the Reference Model of the TIR Procedure\*

Note by the secretariat

**A. BACKGROUND**

1. At its tenth session, the Expert Group mandated the secretariat to start working on the following Chapter of the Reference Model (Analysis) in order to allow discussions on this item at the forthcoming session.

**B. ANALYSIS**

2. The purpose of the Analysis is to translate the requirements identified in the second Chapter (eBusiness requirements) into a specification that enables software developers and message designers to design and implement the eTIR system.

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\* The UNECE Transport Division has submitted the present document after the official documentation deadline.

3. Analysis goals are:

- To build a set of business objects from the requirements contained in Chapter 2,
- To transform the requirements set out in Chapter 2 into a precise, object oriented specification,
- To provide a foundation for the design of electronic messages,
- To provide all actors of the eTIR system with interfaces to hook into their existing information systems,
- To explicitly specify the dynamics of the eTIR system.

4. In order to achieve those goals, Chapter 3 should further describe the dynamics of the eTIR system as they have already been described in the activity diagrams of Chapter 2. It will do so by presenting sequence diagrams for each use case. Sequence diagrams describe in detail the interaction between the actors and the objects of the system and, thus, allow for devising the list of electronic messages necessary for the proper functioning of the eTIR system. An example of a sequence diagram is contained in annex 1.

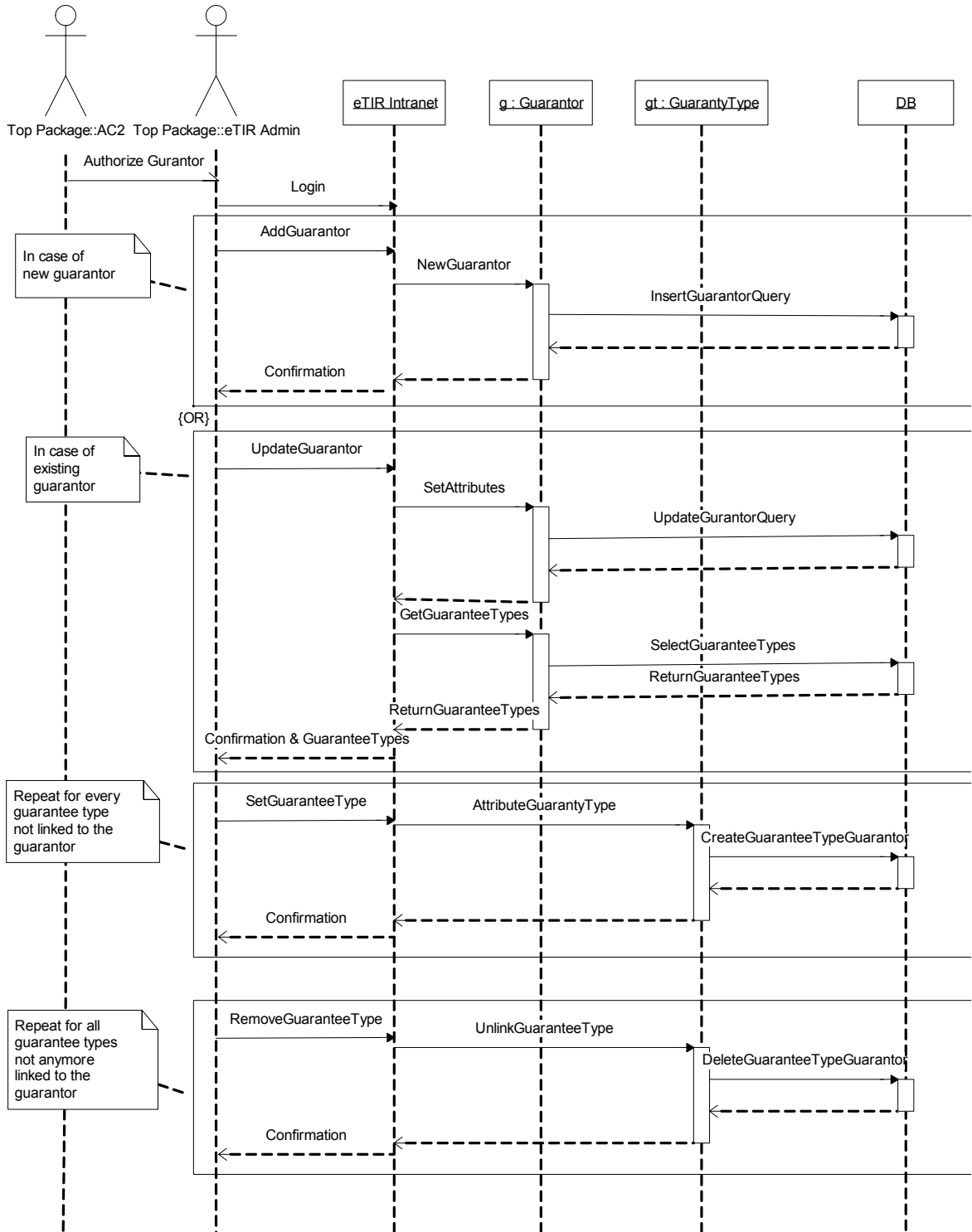
5. In addition, the class diagram presented in Chapter 2 will be further developed in order to include the attributes and the operations in the classes. The attributes will become the data elements in the messages whereas the operations will be the objects methods. The class diagrams will also serve as a basis for the development of the structure of the centralized database.

6. A draft table of content of Chapter 3 is presented in annex 2.

## **B. FURTHER CONSIDERATIONS**

7. The Expert Group may wish to preliminarily consider and discuss Chapter 3 of the Reference Model on the basis of the proposed examples and draft table of contents.

### Annex 1 Register guarantor Sequence diagram



**Annex 2**

**Table of contents of Chapter 3 – Analysis**

**3. ANALYSIS**

**3.1. *ACTIVITY ANALYSIS***

**3.1.1. *Customs management of guarantees***

3.1.1.1. Register guarantor sequence diagram

3.1.1.2. Register guarantee sequence diagram

3.1.1.3. Cancel guarantee sequence diagram

3.1.1.4. Accept guarantee sequence diagram

3.1.1.5. Get operator info sequence diagram

3.1.1.6. Query guarantee sequence diagram

3.1.1.7. Other sequence diagrams

**3.1.2. *Data exchange***

3.1.2.1. Record consignment Sequence diagram

3.1.2.2. Update consignment information Sequence diagram

3.1.2.3. Starting of TIR operation Sequence diagram

3.1.2.4. Terminate TIR operation Sequence diagram

3.1.2.5. Discharge TIR operation Sequence diagram

3.1.2.6. Notify guarantor Sequence diagram

3.1.2.7. Notify subsequent Countries Sequence diagram

3.1.2.8. Other sequence diagrams

**3.2. *CONCEPTUAL CLASS MODEL***

**3.2.1. *Customs management of guarantees class diagram***

**3.2.2. *Data exchange class diagram***

**3.2.3. *Declaration class diagram***

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