**Ix4 Adopted Belief**

Subclass of: I2 Belief

Superclass of

Scope note: This class comprises the notion that an Actor adopted the associated I4 Proposition Set by arguments of trust from a source created by another Actor and holds it as being true or in some way likely to be true. This source can be documented via the property *Jxx5 adopted interpretation of (has adopted interpretation)*. The used interpretation of the meaning of the source may be a belief of the adopting Actor or another one and can be documented as an instance of Ix2 Intended Meaning Belief, if this detail is relevant.

Properties: Jxx2 adopted interpretation of (has adopted interpretation) : E73 Information Object

Examples:

* My belief that…

In First Order Logic:

Ix4(x) ⇒ I2(x)

**Ix2 Intended Meaning Belief**

Subclass of: I2 Belief

Superclass of

Scope note: This class comprises beliefs of an Actor that a particular instance of I4 Proposition Set formally represents a part or all of the meaning intended by a source created by another Actor, without considering an opinion yet about its truth or trustworthiness. The belief constitutes an interpretation of the source. The respective proposition set and can be documented using the property *Jxx6 assumes meaning (is supposed meaning in)*, whereas the respective source can be documented via the property *Jxx7 about (has interpretation)*. and holds it as being true or in some way likely to be true. The used interpretation of the meaning of the source may be a belief of the adopting Actor or another one and can be documented as an instance of Ix2 Intended Meaning Belief, if this detail is relevant.

Properties: Jxx6 assumes meaning (is supposed meaning in): I4 Proposition Set

Jxx7 about (has interpretation): E73 Information Object

Examples:

* My belief that…

In First Order Logic:

Ix2(x) ⇒ I2(x)

**Ix5 Provenance Belief**

Subclass of: I2 Belief

Superclass of

Scope note: This class comprises beliefs of an Actor that a particular instance of E70 Thing, in general available to this Actor, is identical to one present in a relevant event or context of reference in the past, such as a text in a book being sufficiently identical to the one in the claimed author’s original manuscript or edition in order to be used by the Actor for citation. Other examples are the provenance of archaeological objects in collections, which may pertain to the claimed excavation spot or to the inferred context of their creation.

The term “in general available” means that the thing is either physically in the hands of the actor or that the actor or an actor of his trust has the principled ability to get access to the thing. In case that only information objects exist describing the proper thing of interest, such as a photo of a lost archaeological object, an instance of Ix5 Provenance Belief should be based on arguments including references to provenance beliefs about about descriptions, representations and the described things.

A formal description about the assumed provenance can be documented via the property *Jxx8 that*.Note that, depending on the intended argumentation about the respective instance of E70 Thing, different aspects of provenance may be described about the same instance of E70 Thing.

Properties: Jxx8 that (is subject of): I10 Provenance Statement

Examples:

* My belief that….

In First Order Logic:

Ix5(x) ⇒ I2(x)

**I10 Provenance Statement**

Subclass of: I4 Proposition Set

Superclass of:

Scope note: This class comprises statements about the provenance of instances of E70 Thing existing at the time of making the provenance statements. An instance of I10 Provenance Statement must contain propositions about the presence of the respective instances of E70 Thing in an event or spatiotemporal context of reference. Characteristically, it may pertain to the writing by a known author at a known or unknown date or place, or to the existence of the text known to some public regardless the truth of authorship.

In case that only a information objects exist describing the proper thing of interest, such as a photo, or photo of a photo of a lost archaeological object, an instance of I10 Provenance Statement should contain or refer to the relevant chain of intermediate events transfering the information from the proper thing of interest up to the extent information objects taken into account.

The property *Jxx9 is about provenance of* can be used to link the instance of I10 Provenance Statement as a whole with the proper thing of interest. It constitutes a constraint to the provenance statement that it must contain the description of the relevant context of reference and, if applicable, to the relevant chain of intermediate events transfering the information.

Examples:

* The Latin content of the extant book De Vita Caesarum attributed to Gaius Suetonius Tranquillus was published in Rome 121AD and not alienated in its propositional content by essential transcription errors until its currently known form.
* The exemplar of The Merchant of Venice, Quarto 1 (1600) owned by The British Library, shelf number BL C.34.k.22 was published 1600AD by Thomas Heyes.

Properties: Jxx9 is about provenance of (has provenance claim): E70 Thing

In First Order Logic:

I10(x) ⇒ I4(x)

COMMENT:

For I10, I generalize to the Provenance of any Thing. The examples should be CRM propositions, not free text.

COMMENT:

TX6 Reading connects

**I7 Belief Adoption**

Subclass of: [I1](#_S1_Matter_Removal) Argumentation

Superclass of:

Scope note: This class comprises the action of an E39 Actor adopting propositions taken from an interpretation of the intended meaning of an instance of E73 Information Object as being true or in some way likely to be true. The adopted propositions constitute the conclusion of the action in the form of a new instance of Ix4 Adopted Belief of the adopting actor.

The basis of I7 Belief Adoption is the justification of trust in the source of the adopted propositions rather than the application of rules for inferring the respective propositions from logical premises.

Typical examples are the citation of academic papers or the reuse of data sets.

Where an instance of I7 Belief Adoption is based on personal communication (marked as pers.comm. in the studied text) this should be represented by using P2 *has type*: “Pers.Comm.” directly from the instance of I7 Belief Adoption.

Properties: [Jxx5](#_J6_adopted_(adopted) adopted interpretation (was concluded by): [Ix4 Adopted](#_S2_Sample_Taking) Belief

[J7](#_J7_is_based) is based on evidence from (was evidence for): [E73](#_E73_Information_Object) Information Object

Jxx3 assumed meaning (was assumed by): Ix2 Intended Meaning Belief

Jxx4 assuming provenance (was assumed by): Ix5 Provenance Belief

J11 used manifestation (was manifestation used by): F3 Manifestation

**J12** used (was used by): F5 Item

Examples:

* My adoption of the belief that Dragendorff type 29 bowls are from the 1st Century AD

In First Order Logic:

I7(x) ⇒ I1(x)

**Ix1 Meaning Comprehension**

Subclass of: [I1](#_S1_Matter_Removal) Argumentation

Superclass of:

Scope note: This class comprises processes of interpreting the intended meaning of parts or the whole of the content of an instance of E73 Information Object as propositions. Such interpretations may include the disambiguation of the meaning of words and expressions, expanding abbreviations, resolving named entities, references and co-references and co-references and complementing missing text parts, without however arguing about the actual truth of the information.

In principle, any use of an information object pertaining to its meaning implies an instance of Ix1 Meaning Comprehension. However, in practical applications, texts in natural language are often clear enough so that no explicit explanation of the interpretation is needed for the user. In such cases, there is no need to create explicit instances of Ix1 Meaning Comprehension, but the adopted belief may directly be linked via *Jxx2 adopted interpretation of (has adopted interpretation),* or the instance of Ix1 Meaning Comprehension may be made implicit to an instance of I7 Belief Adoption by multiple instantiation.

Explicit documentation of instances of Ix1 Meaning Comprehension are useful, if the interpretations are not obvious and if competing arguments about them are discussed.

Properties: Jxx10 interpreted meaning of: [E73](#_E73_Information_Object) Information Object

Jxx11 interpreted meaning as: Ix2 Intended Meaning Belief

Examples:

* My interpretation of ….

In First Order Logic:

Ix1(x) ⇒ I1(x)

**Ix3 Provenance Assessment**

Subclass of: I5 Inference Making

Superclass of:

Scope note: This class comprises activities of argumenting and concluding about the likely provenance of instances of E70 Thing existing at the time of this activity. These activities may further be about the provenance of things referred to or represented by existing information objects, and subsequent references.

Properties: Jxx1 concluded provenance: Ix5 Provenance Belief

Examples:

* The assessment that the Latin content of the extant book De Vita Caesarum attributed to Gaius Suetonius Tranquillus was published in Rome 121AD and was not alienated in its propositional content by essential transcription errors until its currently known form.

In First Order Logic:

Ix3(x) ⇒ I1(x)

**New Properties**

Ix4 Adopted Belief. Jxx2 adopted interpretation of (has adopted interpretation) : E73 Information Object

Jxx2(x,y) ⇒ Ix4(x)

Jxx2(x,y) ⇒ E73(y)

Ix2 Intended Meaning Belief. Jxx6 assumes meaning (is supposed meaning in): I4 Proposition Set

Jxx6(x,y) ⇒ Ix2(x)

Jxx6(x,y) ⇒ I4(y)

Ix2 Intended Meaning Belief. Jxx7 about (has interpretation): E73 Information Object

Jxx7(x,y) ⇒ Ix2(x)

Jxx7(x,y) ⇒ E73(y)

Ix3 Provenance Assessment. Jxx1 concluded provencance (was assessed by): Ix5 Provenance Belief

Jxx7(x,y) ⇒ Ix2(x)

Jxx7(x,y) ⇒ E73(y)

**Jxx7(x,y) ⇒ J2(x,y)**

Ix5 Provenance Belief. Jxx8 that: I10 Provenance Statement

Jxx8(x,y) ⇒ Ix5(x)

Jxx8(x,y) ⇒ I10(y)

**Jxx8(x,y) ⇒ J4(x,y)**

I10 Provenance Statement. Jxx9 is about provenance of (has provenance claim): E70 Thing, IsA P129 is about (is subject of)

Jxx9(x,y) ⇒ I10(x)

Jxx9(x,y) ⇒ E70(y)

**Jxx8(x,y) ⇒ P129(x,y)**

I7 Belief Adoption. Jxx5 adopted interpretation (was concluded by): Ix4 Adopted Belief

Jxx5(x,y) ⇒ I7(x)

Jxx5(x,y) ⇒ Ix4(y)

**Jxx5(x,y) ⇒ J2(x,y)**

**Jxx5(x,y) ⇐ (∃uvw) [E73(u) ˄ J7(x,u) ˄ Ix2(v) ˄ Jxx3(x,v) ˄ I4(w) ˄ J4(y,w) ˄ Jxx7(u,v) ˄ Jxx6(v,w)]**

I7 Belief Adoption. J7 is based on evidence from (was evidence for): E73 Information Object

J7(x,y) ⇒ I7(x)

J7(x,y) ⇒ E73(y)

I7 Belief Adoption. Jxx3 assumed meaning (was assumed by): Ix2 Intended Meaning Belief

Jxx3(x,y) ⇒ I7(x)

Jxx3(x,y) ⇒ Ix2(y)

**Jxx3(x,y) ⇒ J1(x,y)**

I7 Belief Adoption. Jxx4 assuming provenance (was assumed by): Ix5 Provenance Belief

Jxx4(x,y) ⇒ I7(x)

Jxx4(x,y) ⇒ Ix5(y)

**Jxx4(x,y) ⇒ J1(x,y)**

**Jxx4(x,y) ⇐ (∃uv) [E73(u) ˄ J7(x,u) ˄ I10(v) ˄ Jxx9(v,u) ˄ Jxx8(y,v)]**

Ix1 Meaning Comprehension: Jxx10 interpreted meaning of (was interpreted by): E73 Information Object

Jxx10(x,y) ⇒ Ix1(x)

Jxx10(x,y) ⇒ E73(y)

Ix1 Meaning Comprehension: Jxx11 interpreted meaning as (was interpretation by): Ix2 Intended Meaning Belief

Jxx11(x,y) ⇒ Ix1(x)

Jxx11(x,y) ⇒ Ix2(y)