Title (en)
EXPERT KNOWLEDGE SYSTEM DEVELOPMENT TOOL.

Title (de)
ENTWICKLUNGSWERKZEUG FÜR EXPERTERKENNTNISSYSTEM.

Title (fr)
OUTIL DE DEVELOPPEMENT D'UN SYSTEME DE CONNAISSANCES EXPERT.

Publication
EP 0298078 A4 19891212 (EN)

Application
EP 87901229 A 19870120

Priority
US 8700165 W 19870120

Abstract (en)
[origin: WO8805574A1] An apparatus and method for an expert knowledge system developmental tool (50) comprising a computer (52), a knowledge base (54) and an inference engine (56). The knowledge base (54) defines a plurality of positive and negative rules (402), (410), each rule having one or more antecedents (302) and one conclusion (328). The inference engine (56) includes structures for storing a hypothesis list (100) and for selecting rules that have a conclusion which match each hypothesis and the negative of each hypothesis (110). The inference engine (56) further includes structures for analyzing the selected rules (402), (410) to determine a value of each hypothesis (116-150) and for analyzing the antecedent (302) of each rule to determine a value for each rule (402), (410). Each rule conclusion and antecedent taking the value of either True (168), False (172), Unknown (176) or Untested (186).

IPC 1-7
G06F 15/18

IPC 8 full level
G06F 9/44 (2006.01); **G06N 5/04** (2006.01)

CPC (source: EP)
G06N 5/04 (2013.01)

Citation (search report)
- [A] EP 0205873 A2 19861230 - IBM [US]
- [E] PATENT ABSTRACTS OF JAPAN, vol. 12, no. 194 (P-713), 7th June 1988; & JP-A-63 000 631 (HITACHI LTD) 05-01-1988
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- [A] 1986 PROCEEDINGS FALL JOINT COMPUTER CONFERENCE, Dallas, Texas, 2nd-6th November 1986, pages 353-362, IEEE, New York, US; J. HERATH et al.: "DCBL: Dataflow computing base language with n-value logic"
- [A] ARTIFICIAL INTELLIGENCE, vol. 30, no. 3, December 1986, pages 273-287, Elsevier Science Publishers B.V., North-Holland, Amsterdam, NL; M. GELFOND et al.: "Negation as failure: careful closure procedure"
- [A] PROCEEDINGS OF THE 1986 IEEE INTERNATIONAL CONFERENCE ON SYSTEMS, MAN, AND CYBERNETICS, Atlanta, Georgia, 14th-17th October 1986, pages 1496-1501, IEEE, New York, US; B.K. MOORE: "Reasoning with comparative uncertainty"
- [A] IBM SYSTEMS JOURNAL, vol. 25, no. 2, 1986, Armonk, New York, US; N. BURNS et al.: "The portable inference engine: fitting significant expertise into small systems"
- [A] 1986 PROCEEDINGS FALL JOINT COMPUTER CONFERENCE, Dallas, Texas, 2nd-6th November 1986, pages 185-189, IEEE, New York, US; R.J.K. JACOB et al.: "Software engineering for rule-based systems"
- See references of WO 8805574A1

Designated contracting state (EPC)
AT BE CH DE FR GB IT LI LU NL SE

DOCDB simple family (publication)
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