

ADAS Subroutine wupsilon

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      SUBROUTINE WUPSILON( ELO    , EHI    , DELTAE, KTYPE , GF    ,
&                          CPAR    , YKN    , I1    , I2    , NELEC ,
&                          NCHAR   , NTEMP  , T      , UPS    , DSFULL,
&                          ISTDIM, NET    , ENTE   , OMUP   , IWRITE,
&                          INDIM   , WI     , WJ     )
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C *****
C ***** FORTRAN77 SUBROUTINE:WUPSILON*****
C
C PURPOSE: TO WRITE DATA TO AN OLD/NEW ARCHIVE IN BURGESS FORMAT
C
C INPUT:
C      (R*8) ELO    - LOWER LEVEL ENERGY
C      (R*8) EHI    - UPPER LEVEL ENERGY
C      (R*8) DELTAE - TRANSITION ENERGY
C      (I)  KTYPE   - TRANSITION TYPE
C      (R*8) GF     - WEIGHTED OSCILLATOR STRENGTH
C      (R*8) CPAR   - SCALABLE PARAMETER
C      (R*8) YKN    - KNOT POINTS
C      (I)  I1     - LOWER LEVEL INDEX
C      (I)  I2     - UPPER LEVEL INDEX
C      (R*8) NELEC  - NUMBER OF ELECTRONS
C      (R*8) NCHAR  - NUCLEAR CHARGE
C      (I)  NTEMP   - NUMBER OF TEMPERATURE POINTS
C      (R*8) T      - TEMPERATURES
C      (R*8) UPS    - UPSILONS
C      (C*80)DSFULL - ARCHIVE FILE NAME
C      (I)  ISTDIM  - MAXIMUM INPUT ARRAY DIMENSIONS
C      (I)  NET     - NUMBER OF ENERGY POINTS
C      (R*8) ENTE   - ENRGIES
C      (R*8) OMUP   - OMEGAS
C      (I)  IWRITE  - OUTPUT UNIT NUMBER
C      (I)  INDIM   - MAXIMUM OUTPUT ARRAY DIMENSION
C      (R*8) WI     - LOWER LEVEL STATISTICAL WEIGHT
C      (R*8) WJ     - UPPER LEVEL STATISTICAL WEIGHT
C
C OUTPUT:
C
C DATA:
C      CIARR(500)*80- 500 IS THE CURRENT LIMIT ON INDEXES
C
C ROUTINES:
C      NONE
C
C AUTHOR:
C      DAVID H.BROOKS (UNIV.OF STRATHCLYDE) EXT.4213/4205
C
C DATE: 28/06/95 VERSION 1.1
C UPDATED: DAVID H.BROOKS
C - FIRST RELEASE
C
C DATE: 13/05/99 VERSION 1.2
C MODIFIED: HUGH SUMMERS
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C - CORRECTED CONFUSION ABOUT NCHAR AND NELEC IN COMMENTS
 C INSERTED LEADING DECIMAL IN OUTPUT FLOATING FORMATS
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CHARACTER*80	DSFULL			
INTEGER	I1,	I2,	INDIM,	ISTDIM
INTEGER	IWRITE,	KTYPE,	NET,	NTEMP
REAL*8	CPAR,	DELTAE,	EHI,	ELO
REAL*8	ENTE (ISTDIM) ,		GF,	NCHAR
REAL*8	NELEC,	OMUP (ISTDIM)		
REAL*8	T (ISTDIM) ,	UPS (INDIM) ,	WI,	WJ
REAL*8	YKN (5)			