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# INTERNATIONAL SERVICE OF GEOMAGNETIC INDICES

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## MONTHLY BULLETIN OCTOBER 2016

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# 1 IAGA Endorsed Geomagnetic Indices (non-definitive values)

## 1.1 *aa*

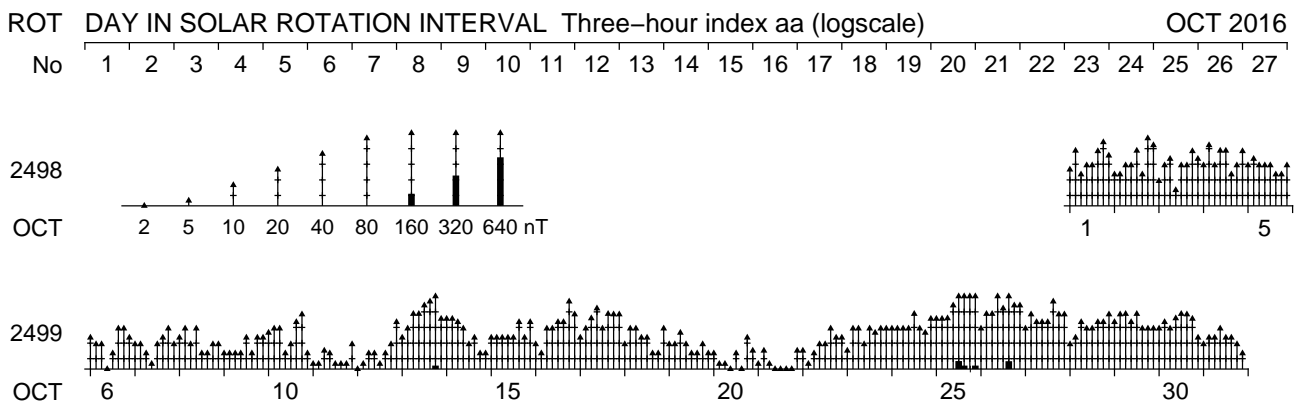
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## 1.2 *am*

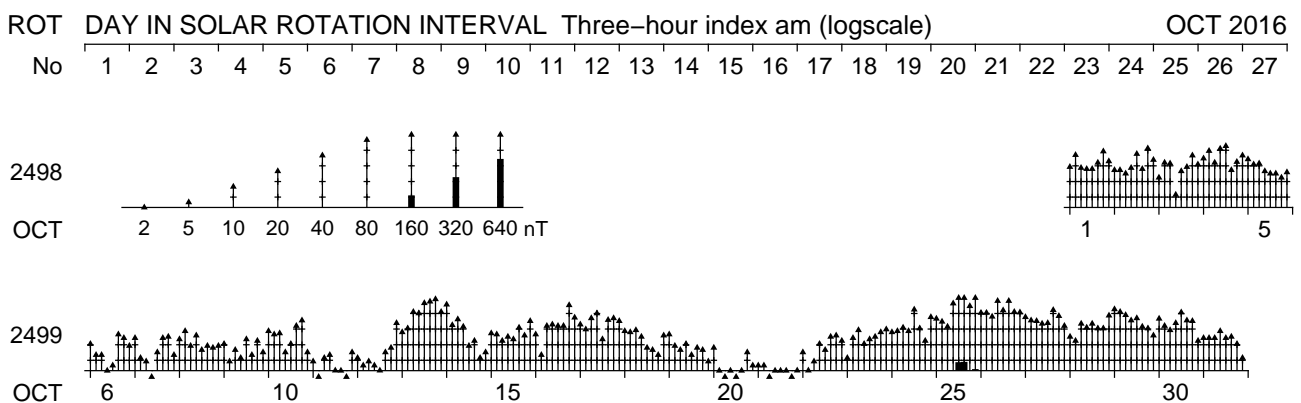
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### 1.3 $K_p$

#### ISGI Collaborating Institute:

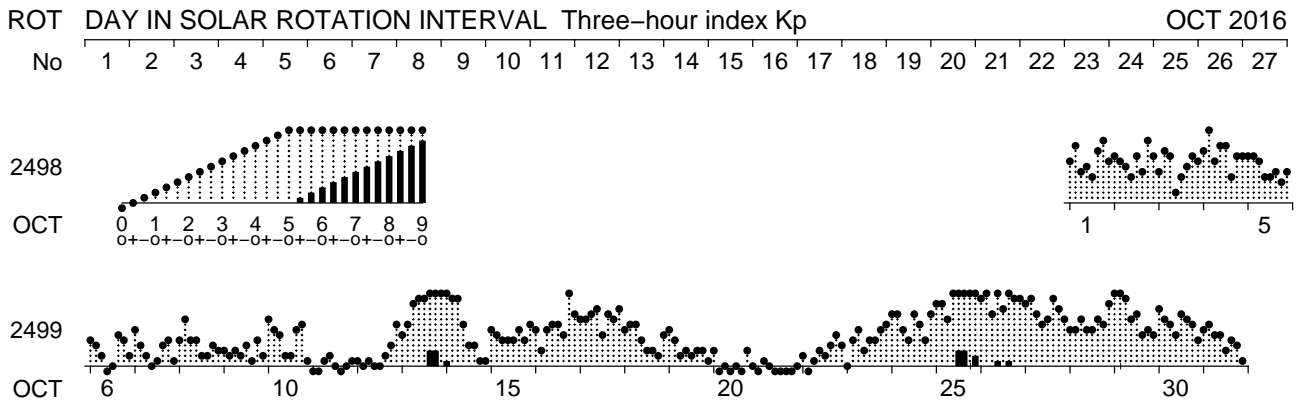
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## 1.4 *Dst*

### ISGI Collaborating Institute:

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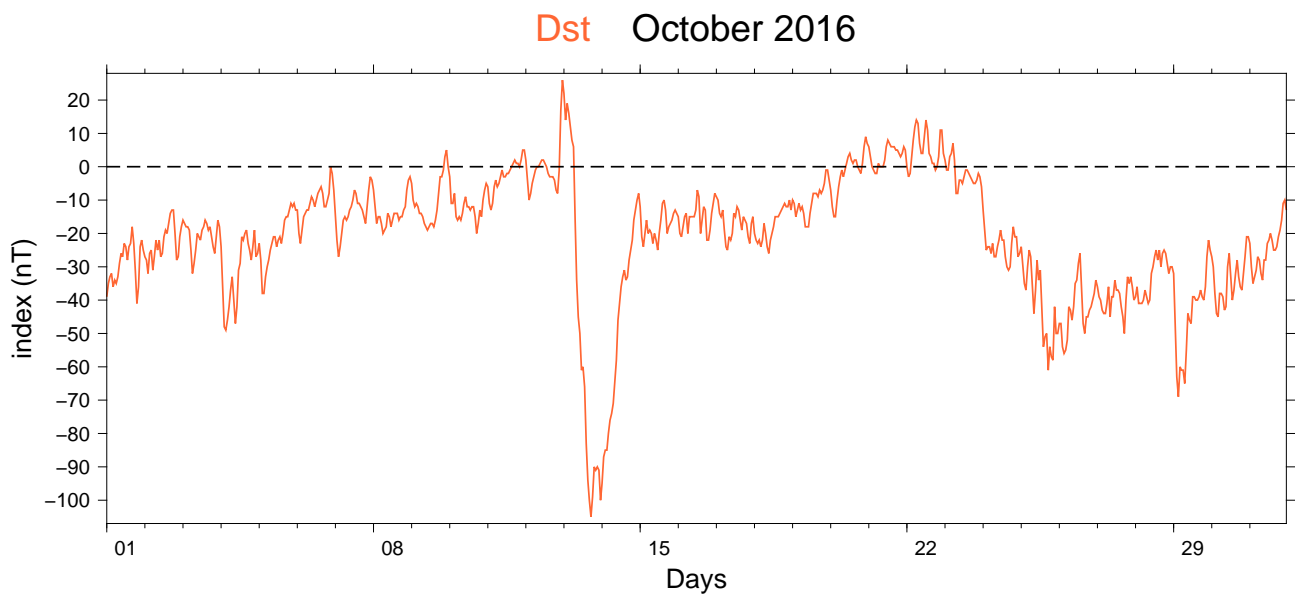
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*Graduate School of Science, Kyoto University*

*Kitashirakawa-Oiwake Cho, Sakyo-ku*

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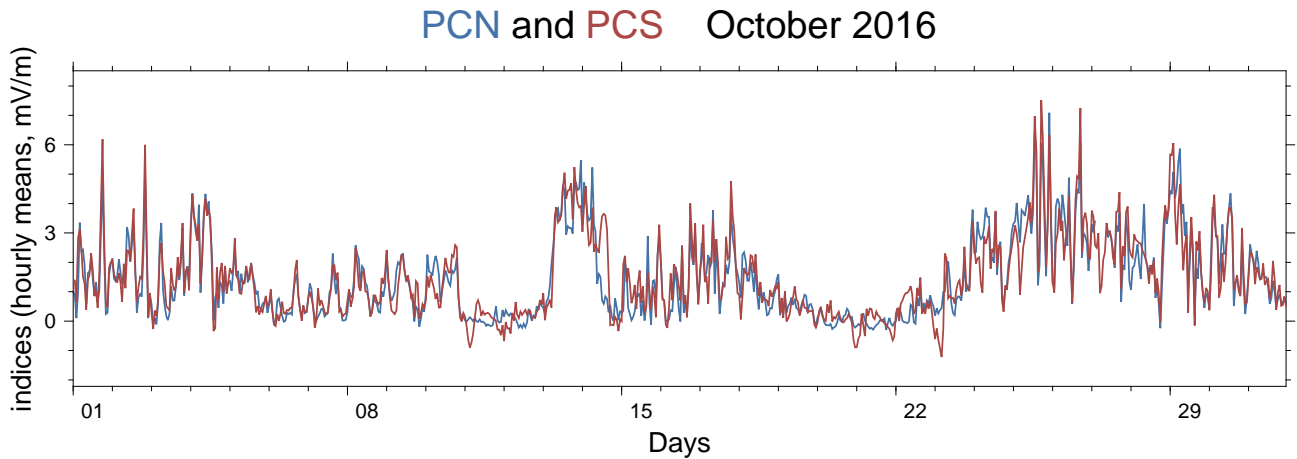


## 1.5 PC

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## 1.6 *AE*

### ISGI Collaborating Institute:

*World Data Center for Geomagnetism, Kyoto*

*Data Analysis Center for Geomagnetism and Space Magnetism*

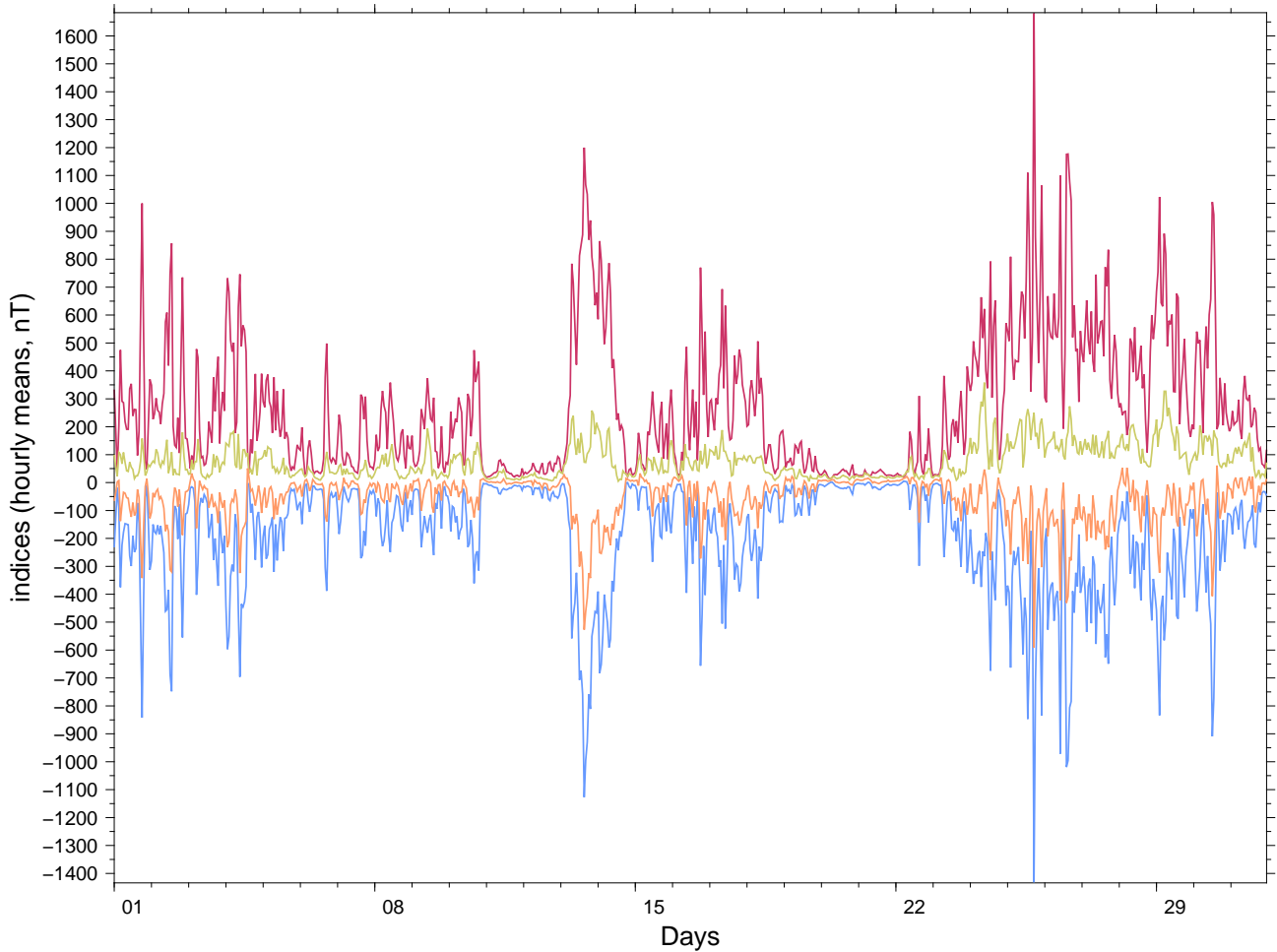
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**AE, AU, AL and AO** October 2016



## 2 IAGA Endorsed Geomagnetic Events (non-definitive values)

### 2.1 *SSC* and *SFE*

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SSC:

2016 10 12 22 13 A: GNG\* CNB\*  
B: LER ESK HAD DOU BDV MMB EBR SPT KAK KNY HYB

2016 10 25 09 22 C: LER ESK VAL HAD GCK

SFE:

NONE

## 2.2 Classification of days

### ISGI Collaborating Institutes:

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Date	Aa	CK24	CK48	Ap	Q/D
2016-10-01	35	-	-	17	
2016-10-02	35	-	-	16	
2016-10-03	25	-	-	13	
2016-10-04	36	-	-	23	
2016-10-05	23	-	-	11	
2016-10-06	14	-	-	5	Q7
2016-10-07	13	-	-	5	Q8
2016-10-08	15	-	-	7	Q10A
2016-10-09	11	C	-	5	Q4
2016-10-10	22	-	-	10	
2016-10-11	7	C	K	2	Q2
2016-10-12	10	K	-	5	Q6K
2016-10-13	54	-	-	46	D3
2016-10-14	22	-	-	22	
2016-10-15	20	-	-	10	
2016-10-16	32	-	-	17	
2016-10-17	37	-	-	20	
2016-10-18	17	-	-	9	
2016-10-19	12	C	C	6	Q9
2016-10-20	7	C	C	2	Q3
2016-10-21	5	C	C	1	Q1
2016-10-22	13	-	K	5	Q5
2016-10-23	20	-	-	8	
2016-10-24	28	-	-	16	
2016-10-25	81	-	-	57	D1
2016-10-26	68	-	-	44	D2
2016-10-27	42	-	-	26	D5
2016-10-28	27	-	-	16	
2016-10-29	34	-	-	27	D4
2016-10-30	33	-	-	16	
2016-10-31	15	-	-	8	



### 2.2.1 Truly magnetically very quiet (C) and quiet (K) periods (from $aa$ )

The values for the CK24 define quietest days over 24-hours with:

$$\overline{(aa)} = Aa < 13 \text{ nT} \begin{cases} \text{“K” indicates a quiet K-day with } \sum(p) \geq 4 \\ \text{“C” indicates a really quiet C-day with } \sum(p) < 4 \end{cases}$$

The values for the CK48 define quietest days over 48-hours with:

$$\overline{(aa)} < 13 \text{ nT} \begin{cases} \text{“K” indicates a quiet K-day with } \sum(p) \geq 6 \\ \text{“C” indicates a really quiet C-day with } \sum(p) < 6 \end{cases}$$

where  $p$  is a weight assigned at each  $aa$  value.

### 2.2.2 10 international quietest days (Q1-10) and 5 most disturbed days (D1-5)

The values for  $Q$ -Days,  $Q1 - Q10$ , are the order number of the ten quietest days of the month.

A selected quiet day is considered not really quiet and is:

- marked by the letter “A” if ( $Ap > 6 \text{ nT}$ );
- marked by the letter “K” if ( $Ap \leq 6 \text{ nT}$ ), or if one ( $Kp > 3$ ), or two ( $Kp > 2+$ ).

The values for  $D$ -Days,  $D1 - D5$ , are the order number of the five most disturbed days of the month. A selected disturbed day is considered not really disturbed and marked by “\*” if ( $Ap < 20 \text{ nT}$ ).