Pioneer

A/V Receiver Control Commands List

Request AUDIO information Parameter by ASCII code

```
?AST<CR>
AST(data1)(data2)......(data42)(data43)<CR+LF>
   ex DOLBY DIGITAL 3/2/.1 in PRO LOGIC2 MOVIE playing, SP setting 7.1ch(SBch*2),
      AST050211111000100000000000111111011000000000<CR+LF>
```

data1-data2:Audio Input Signal

Data	Parameter	Signal
(data1)(data2)	00	ANALOG
	01	ANALOG
	02	ANALOG
	03	PCM
	04	PCM
	05	DOLBY DIGITAL
	06	DTS
	07	DTS-ES Matrix
	08	DTS-ES Discrete
	09	DTS 96/24
	10	DTS 96/24 ES Matrix
	11	DTS 96/24 ES Discrete
	12	MPEG-2 AAC
	13	WMA9 Pro
	14	DSD->PCM
	15	HDMI THROUGH
	16	DOLBY DIGITAL PLUS
	17	DOLBY TrueHD
	18	DTS EXPRESS
	19	DTS-HD Master Audio
	20	DTS-HD High Resolution
	21	DTS-HD High Resolution
	22	DTS-HD High Resolution
	23	DTS-HD High Resolution
	24	DTS-HD High Resolution
	25	DTS-HD High Resolution
	26	DTS-HD High Resolution
	27	DTS-HD Master Audio

data3-data4:Audio Input Frequency

Data	Parameter	Frequency
(data3)(data4)	00	32kHz
	01	44.1kHz
	02	48kHz
	03	88.2kHz
	04	96kHz
	05	176.4kHz
	06	192kHz

data5-data25:Audio Input Channel Format

Data	Parameter	Channel Format info
(data5)	0 or 1	L : L
(data6)	0 or 1	C : C
(data7)	0 or 1	R : R
(data8)	0 or 1	SL : Ls
(data9)	0 or 1	SR : Rs
(data10)	0 or 1	SBL : Lsr,Lrs,Lb
(data11)	0 or 1	S : Cs,ES,EX,LtRt
(data12)	0 or 1	SBR : Rsr,Rrs,Rb
(data13)	0 or 1	LFE : LFE
(data14)	0 or 1	FHL : Lh,Lvh
(data15)	0 or 1	FHR : Rh,Rvh
(data16)	0 or 1	FWL : Lw
(data17)	0 or 1	FWR : Rw
(data18)	0 or 1	XL : Lhs,Lhr,Lss,Lc,Lsd,
(data19)	0 or 1	XC : Ts,Oh,Ch,Chr,LFE2,Cvh
(data20)	0 or 1	XR : Rhs,Rhr,Rss,Rc,Rsd,
(data21)	0 or 1	(Reserved For Future, 0 fixed.)
(data22)	0 or 1	(Reserved For Future, 0 fixed.)
(data23)	0 or 1	(Reserved For Future, 0 fixed.)
(data24)	0 or 1	(Reserved For Future, 0 fixed.)
(data25)	0 or 1	(Reserved For Future, 0 fixed.)

data26-data43:Audio Output Channel

Data	Parameter	Output Channel
(data26)	0 or 1	L
(data27)	0 or 1	C
(data28)	0 or 1	R
(data29)	0 or 1	SL
(data30)	0 or 1	SR
(data31)	0 or 1	SBL
(data32)	0 or 1	SB
(data33)	0 or 1	SBR
(data34)	0 or 1	SW
(data35)	0 or 1	FHL
(data36)	0 or 1	FHR
(data37)	0 or 1	FWL
(data38)	0 or 1	FWR
(data39)	0 or 1	(Reserved For Future, 0 fixed.)
(data40)	0 or 1	(Reserved For Future, 0 fixed.)
(data41)	0 or 1	(Reserved For Future, 0 fixed.)
(data42)	0 or 1	(Reserved For Future, 0 fixed.)
(data43)	0 or 1	(Reserved For Future, 0 fixed.)
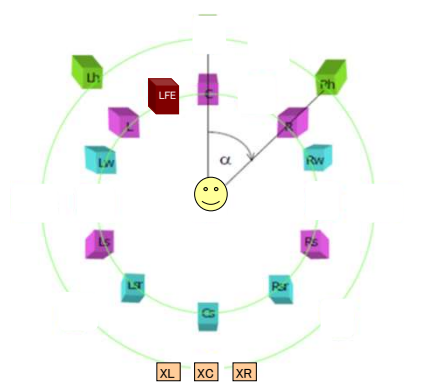
Request VIDEO information Parameter by ASCII code

?VST<CR>
VST(data1)(data2)......(data24)(data25)<CR+LF>

data1:Input Terminal

Data	Parameter	Signal from below
(data1)	0	---
	1	VIDEO
	2	S-VIDEO
	3	COMPONENT
	4	HDMI
	5	Self OSD/JPEG

data2-3:Input Resolution

Data	Parameter	Signal Format
(data2)(data3)	00	---
	01	480/60i
	02	576/50i
	03	480/60p
	04	576/50p
	05	720/60p
	06	720/50p
	07	1080/60i
	08	1080/50i
	09	1080/60p
	10	1080/50p
	11	1080/24p

data4:Input aspect

Data	Parameter	Signal Format
(data4)	0	---
	1	4:3
	2	16:9
	3	14:9

data5:Input color format(HDMI only)

Data	Parameter	Signal Format
(data5)	0	---
	1	RGB Limit
	2	RGB Full
	3	YcbCr444
	4	YcbCr422

data6:Input bit(HDMI only)

Data	Parameter	Signal Format
(data7)	0	---
	1	24bit (8bit*3)
	2	30bit (10bit*3)
	3	36bit (12bit*3)
	4	48bit (16bit*3)

data7:Input extend color space(HDMI only)

Data	Parameter	Signal Format
(data7)	0	---
	1	Standard
	2	xvYCC601
	3	xvYCC709
	4	sYCC
	5	AdobeYCC601
	6	AdobeRGB

data8-9:Output Resolution

Data	Parameter	Signal Format
(data8)(data9)	00	---
	01	480/60i
	02	576/50i
	03	480/60p
	04	576/50p
	05	720/60p
	06	720/50p
	07	1080/60i
	08	1080/50i
	09	1080/60p
	10	1080/50p
	11	1080/24p

data10:Output aspect

Data	Parameter	Signal Format
(data10)	0	---
	1	4:3
	2	16:9
	3	14:9

data11:Output color format(HDMI only)

Data	Parameter	Signal Format
(data11)	0	---
	1	RGB Limit
	2	RGB Full
	3	YcbCr444
	4	YcbCr422

data12:Output bit(HDMI only)

Data	Parameter	Signal Format
(data12)	0	---
	1	24bit (8bit*3)
	2	30bit (10bit*3)
	3	36bit (12bit*3)
	4	48bit (16bit*3)

data13:Output extend color space(HDMI only)

Data	Parameter	Signal Format
(data13)	0	---
	1	Standard
	2	xvYCC601
	3	xvYCC709
	4	sYCC
	5	AdobeYCC601
	6	AdobeRGB

data14-15:HDMI 1 Monitor Recommend Resolution Information

Data	Parameter	Recommend Signal Format
(data14)(data15	00	---
	01	480/60i
	02	576/50i
	03	480/60p
	04	576/50p
	05	720/60p
	06	720/50p
	07	1080/60i
	08	1080/50i
	09	1080/60p
	10	1080/50p
	11	1080/24p

data16:HDMI 1 Monitor DeepColor

Data	Parameter	Signal Format
(data16)	0	---
	1	24bit (8bit*3)
	2	30bit (10bit*3)
	3	36bit (12bit*3)
	4	48bit (16bit*3)

data17-21:HDMI 1 Monitor Extend Color Space

Data	Parameter	Correspondence Format
(data17)	0 or 1	xvYCC601
(data18)	0 or 1	xvYCC709
(data19)	0 or 1	sYCC
(data20)	0 or 1	AdobeYCC601
(data21)	0 or 1	AdobeRGB

data22-23:HDMI 2 Monitor Recommend Resolution Information

Data	Parameter	Signal Format
(data22)(data23)	00	---
	01	480/60i
	02	576/50i
	03	480/60p
	04	576/50p
	05	720/60p
	06	720/50p
	07	1080/60i
	08	1080/50i
	09	1080/60p
	10	1080/50p
	11	1080/24p

data24:HDMI 2 Monitor DeepColor

Data	Parameter	Signal Format
(data24)	0	---
	1	24bit (8bit*3)
	2	30bit (10bit*3)
	3	36bit (12bit*3)
	4	48bit (16bit*3)

data25-29:HDMI 2 Monitor Extend Color Space

Data	Parameter	Correspondence Format
(data25)	0 or 1	xvYCC601
(data26)	0 or 1	xvYCC709
(data27)	0 or 1	sYCC
(data28)	0 or 1	AdobeYCC601
(data29)	0 or 1	AdobeRGB