

# Устранение неисправностей и конфигурация передачи сигналов E1 R2

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## Введение

В этом документе предложены последовательные записи команд, необходимые для осуществления сигнализации E1 R2. **Этот документ также содержит сведения об устранении неполадок с командами отладки.**

**Примечание:** Перед использованием этого документа рекомендуется что вы первая [Теория сигнализации E1 R2](#) чтения.

## Предварительные условия

### Требования

Перед применением этой конфигурации убедитесь в выполнении следующих предварительных условий:

- Сигнализация R2 применяется только к E1.
- Сигнализация R2 не поддерживается маршрутизатором Cisco MC3810.
- Для выполнения R2, сигнализирующего на Маршрутизаторах серии Cisco 2600/3600, эти

аппаратные средства требуются: VVIC-1MFT-E1 или VVIC-2MFT-E1 или VVIC-2MFT-E1-DI наряду с одним из этих речевых модулей плотности: [NM-HDV](#) (Голосовой сетевой модуль высокой плотности) или NM-HD-2VE (сетевой голосовой/факсимильный модуль IP-коммуникаций с 2 слотами).

- Определите команду **ds0-group** (или **cas-group**, на основе версии Cisco IOS®) на Контроллерах e1 (AS5x00, маршрутизаторы Cisco 2600/3600).
- Используйте команду **cas-custom** для настройки вариантов E1 R2 для разных стран или областей.

## Используемые компоненты

Сведения в этом документе основываются на этой версии программного и аппаратного обеспечения:

- Cisco AS5300 с Cisco IOS Software Release 12.0.7T

**Примечание:** Сигнализация E1 R2 была представлена Маршрутизаторам серии Cisco 2600/3600 в Cisco IOS Software Release 12.1.2XH и 12.1 (3) T.

Сведения, представленные в этом документе, были получены от устройств, работающих в специальной лабораторной среде. Все устройства, описанные в этом документе, были запущены с чистой (стандартной) конфигурацией. В рабочей сети необходимо изучить потенциальное воздействие всех команд до их использования.

## Условные обозначения

[Дополнительные сведения об условных обозначениях см. в документе Технические рекомендации Cisco. Условные обозначения.](#)

## Настройка

Этот раздел предоставляет вам информацию, которую можно использовать для настройки E1 R2.

**Примечание:** Для обнаружения дополнительных сведений об использовании этого документа команд обратитесь к [Средству поиска команд Command Lookup Tool \(только зарегистрированные клиенты\)](#).

## AS5300: Совместимость Cisco IOS и программного обеспечения голосовой платы (VFC)

Прежде чем вы внедрите E1 R2, сигнализирующий в Маршрутизаторе Cisco AS5300, гарантируете, что ваша версия программного обеспечения Cisco IOS совместима с Cisco VCWare в модуле E1. Для проверки совместимости программного обеспечения Cisco IOS обратитесь к [Матрице совместимости Cisco VCWare для Cisco AS5300](#). Если версии несовместимы, то модули цифрового процессора сигналов (DSP) не загружаются в голосовую карту, и обработки голосового сигнала не происходит.

Как правило, если версия Cisco VCWare несовместима с программным обеспечением Cisco IOS, можно ввести команду `show vfc slot_number interface` для наблюдения этого как

показано в данном примере.

```
eefje#show vfc 1 interface Rx: in ptr 18, outptr 0 Tx: in ptr 14 outptr 14 0 in hw queue, 0
queue head , 0 queue tail Hardware is VFC out-of-band channel Interface : state RESET DSP
instance (0x61048284) dsp_number 0, Channel ID 0 TX outstanding 0, max TX outstanding 0 Received
18 packets, 1087 bytes, 0 giant packets 0 drops, 0 no buffers, 0 input errors 121 bytes output,
14 frames output 0 bounce errors 0 DSP module 1 is not installed DSP module 2 is not installed
DSP module 3 is not installed DSP module 4 is not installed DSP module 5 is not installed
```

В первом примере выходных данных *команды show vfc slot\_number interface* операторы DSP module number is not installed показывают, что версии несовместимы для того номера модуля.

Этот второй набор выходных данных является примером модулей DSP, которые имеют корректную загруженную версию Cisco VCWare:

```
eefje#show vfc 1 interface Rx: in ptr 24, outptr 0 TX: in ptr 15 outptr 15 0 in hw queue, 0
queue head , 0 queue tail Hardware is VFC out-of-band channel Interface : state RESET DSP
instance (0x618C6088) dsp_number 0, Channel ID 0 TX outstanding 0, max TX outstanding 0 Received
283288 packets, 15864278 bytes, 0 giant packets 0 drops, 0 no buffers, 0 input errors 1416459
bytes output, 141647 frames output 0 bounce errors 0 Slot 1, DSPM 1 (C542), DSP 1, Channel 1
State RESET, DSP instance (0x61914BDC) TX outstanding 0, max TX outstanding 8 Received 0
packets, 0 bytes, 0 giant packets 0 drops, 0 no buffers, 0 input errors 0 bytes output, 0 frames
output 0 bounce errors 0 Slot 1, DSPM 1 (C542), DSP 2, Channel 1 State RESET, DSP instance
(0x6191510C) TX outstanding 0, max TX outstanding 8 Received 0 packets, 0 bytes, 0 giant packets
0 drops, 0 no buffers, 0 input errors 0 bytes output, 0 frames output 0 bounce errors 0
```

Для проверки установленной версии Cisco VCWare введите *команду show vfc slot\_number version vcware*, как показано в данном примере:

```
eefje#show vfc 1 version vcware Voice Feature Card in Slot 1: VCware Version : 4.10 ROM Monitor
Version : 1.2 DSPware Version : Technology : C542
```

**Примечание:** Удостоверьтесь, что версия технологии Cisco VCWare (c549 или c542) совпадает с установленной технологией DSP VFC (DSPM-542: поддержка голосовых данных с обычной плотностью или DSPM-549: поддержка передачи голосовых данных высокой плотности).

## [Настройте E1 R2](#)

Выполните эти шаги для настройки E1 R2:

1. Установите controller E1, который соединяется с учрежденческой АТС (УАТС) или коммутатор. Гарантируйте, что должным образом установлены формирование кадров и линейное кодирование E1.
2. Для формирования кадров E1 выберите **CRC** или **не-CRC**.
3. Для линейного кодирования E1 выберите **HDB3** или **AMI**.
4. Для источника синхронизации E1 выберите или **внутренний** или **линия**. Помните, что разные PBX имеют разные требования к источнику тактовых импульсов.
5. [Сконфигурируйте сигнализацию на линии.](#)
6. [Настройте межрегистровую отправку сигналов.](#)
7. Настройте конфигурацию с командой **cas-custom**.

## [Сконфигурируйте сигнализацию на линии](#)

Используйте эту последовательность команд для того, чтобы определить вашу

сигнализацию на линии.

```
eefje(config)#controller E1 0 eefje(config-controller)#ds0-group 1 timeslots 1-15 type ? ...  
r2-analog R2 ITU Q411 r2-digital R2 ITU Q421 r2-pulse R2 ITU Supplement 7 ...
```

Это - последовательность команд для программного обеспечения Cisco IOS версии 11.3.

```
eefje(config)#controller E1 0 eefje(config-controller)#cas-group 1 timeslot 1-15 type ? ...
```

**Примечание:** Если вы обновляете от программного обеспечения Cisco IOS версии 11.3 до 12.0, новая команда заменяет старый автоматически.

### [Настройте межрегистровую отправку сигналов](#)

Этот пример последовательности команд иллюстрирует, как настроить различные типы межрегистровой отправки сигналов:

```
eefje(config)#controller E1 0 eefje(config-controller)#ds0-group 1 timeslots 1-15 type r2-  
digital ? dtmf DTMF tone signaling r2-compelled R2 Compelled Register Signaling r2-non-compelled  
R2 Non Compelled Register Signaling r2-semi-compelled R2 Semi Compelled Register Signaling
```

Реализация Cisco сигнализации R2 имеет поддержку Dialed Number Identification Service (DNIS), включенную по умолчанию. При включении опции Automatic Number Identification (ANI) сбор сведений DNIS все еще выполнен. Спецификация параметра ANI не отключает сбор DNIS. DNIS является номером, который вызывают. ANI является количеством абонента. Например, при настройке маршрутизатора под названием для вызова маршрутизатора по имени B, тогда Набранный номер назначен на маршрутизатор B, и номер ANI назначен на маршрутизатор A. ANI аналогичен идентификатору вызывающей стороны (Caller ID).

### [Пользовательская настройка сигнализации R2 для каналов E1 с помощью команды "cas-custom"](#)

Подкоманды при команде **cas-custom** используются для размещения вариантов для страны. Они также используются для настройки параметров сигнализации по выделенному каналу (CAS). Эта последовательность команд иллюстрирует, как можно просмотреть все параметры командной строки **cas-custom**.

```
eefje(config)#controller E1 0 eefje(config-controller)#cas-custom 1 eefje(config-ctrl-cas)#? CAS  
custom commands: ani-digits Expected number of ANI digits ani-timeout Timeout for ANI digits  
answer-guard-time Wait Between Group-B Answer Signal And Line Answer answer-signal Answer signal  
to be used caller-digits Digits to be collected before requesting CallerID category Category  
signal country Country Name debounce-time Debounce Timer default Set a command to its defaults  
dnis-complete Send I-15 after DNIS digits for dial-out dnis-digits Expected number of DNIS  
digits exit Exit from cas custom mode groupa-callerid-end Send Group-A Caller ID End invert-abcd  
invert the ABCD bits before TX and after rx ka kA Signal kd KD Signal metering R2 network is  
sending metering signal nc-congestion Non Compelled Congestion signal no Negate a command or set  
its defaults proceed-to-send Suppress proceed-to-send signal for pulsed line signaling release-  
ack Send Release Acknowledgment to Clear Forward release-guard-time Release Guard Timer request-  
category DNIS Digits to be collected before requesting category seizure-ack-time Seizure to  
Acknowledge timer unused-abcd Unused ABCD bit values
```

Для получения дополнительной информации о параметрах команды **cas-custom** обратитесь к [Настройке E1 R2 с помощью команды cas-custom](#).

### [Схема сети](#)

В настоящем документе используется следующая схема сети.

## Конфигурации

В целях этого документа это три других конфигурации R2, которые показывают через интерфейс E1:

- [Digital Non-compelled R2](#)
- [R2, цифровой полувынужденный](#)
- [R2 цифровой вынужденный ANI](#)

Конфигурации модифицировались, чтобы показать только информацию, что этот документ обсуждает.

### **eefje, Настроенный для Digital Non-Compelled R2**

```
hostname eefje
!
controller E1 0
  clock source line primary
  ds0-group 1 timeslots 1-15 type r2-digital r2-non-
  compelled
  cas-custom 1
!--- For more information on these commands !--- refer
to ds0-group and cas-custom. ! voice-port 0:1 cptone BE
!--- The cptone command is country specific. For more !-
-- information on this command, refer to cptone. !
dial-peer voice 123 pots destination-pattern 123 direct-
inward-dial port 0:1 prefix 123 ! dial-peer voice 567
voip destination-pattern 567 session target ipv4:2.0.0.2
!
```

### **eefje, Настроенный для R2, Цифрового Полувынужденный**

```
hostname eefje
!
controller E1 0
  clock source line primary
  ds0-group 1 timeslots 1-15 type r2-digital r2-semi-
  compelled
  cas-custom 1
!--- For more information on these commands !--- refer
to ds0-group and cas-custom. ! voice-port 0:1 cptone BE
!--- The cptone command is country specific. For more !-
-- information on this command, refer to cptone. dial-
peer voice 123 pots destination-pattern 123 direct-
inward-dial port 0:1 prefix 123 ! dial-peer voice 567
voip destination-pattern 567 session target ipv4:2.0.0.2
!
```

### **eefje, Настроенный для Цифрового Вынужденного ANI R2**

```
hostname eefje
! controller E1 0 clock source line primary ds0-group
1 timeslots 1-15 type r2-digital r2-compelled ani cas-
custom 1
!--- For more information on these commands !--- refer
to ds0-group and cas-custom. voice-port 0:1 cptone BE
!--- The cptone command is country specific. For more !-
-- information on this command, refer to cptone. dial-
peer voice 123 pots destination-pattern 123 direct-
inward-dial port 0:1 prefix 123 ! dial-peer voice 567
voip destination-pattern 567 session target ipv4:2.0.0.2
!
```

## Проверка

В настоящее время для этой конфигурации нет процедуры проверки.

## Устранение неполадок

В этом разделе описывается процесс устранения неполадок конфигурации.

### Сбои E1 R2 устранения неполадок

Это - сведения об устранении проблем, относящиеся к этой конфигурации. Следуйте этим инструкциям для устранения проблем конфигурации.

1. Проверьте, что controller E1 0 подключен. Если не работает, то проверьте фрейминг, кодировку линии, источник синхронизации, предупреждения, замените кабель, переустановите карту, и прочее. Используйте документ [Настройки E1 R2 с помощью команды cas-custom](#) в качестве ссылки.
2. При использовании AS5300 проверьте, что DSP правильно установлены с командой *show vfc slot number interface*.
3. Настройте Direct Inward Dial (DID) на узле Plain Old Telephone Service (POTS) (обычная телефонная сеть), так, чтобы принятые цифры использовались для выбора адресуемого узла.
4. Задайте [cptone](#) (*cptone* является определенным для вашей страны) на голосовых портах. *cptonecountry* команда должна быть настроена для соответствия с командой *страны cas-custom*. Наборы параметров *cptone* звуки хода вызова для определенной страны, и что еще более важно устанавливают кодирование в а-закон или u-law, который зависит от страны. Кодировка по умолчанию для US является u-law.
5. Соответствие линии и условия сигнализации регистра к конфигурации коммутатора.
6. Включите некоторые **отладки**, показанные в этом документе, и изучите выходные данные.
7. Проверьте наличие связи между маршрутизатором и PBX или коммутатором: Захвачена ли линия? Маршрутизатор получает и отправляет числа? Узнайте, какая сторона очищает вызов. Если возможно, используйте последние Cisco IOS Software Release, доступные на Cisco.com.

### команды "debug" и "show"

Некоторые команды *show* поддерживаются Средством интерпретации выходных данных (только зарегистрированные клиенты), которое позволяет просматривать аналитику выходных данных команды *show*.

**Примечание:** Перед запуском команд отладки обратитесь к [разделу Важные сведения о командах отладки](#).

**Примечание:** Для программного обеспечения Cisco IOS версии 12.0 используйте эти отладки:

- **debug cas** - Для сигнала линии.

- **debug csm voice** - Для межрегистровой отправки сигналов.
- **debug vtsp all**- Для имения выходных данных всех сообщений (цифры), которыми обмениваются между УАТС и маршрутизатором.

Для Cisco IOS Software Release IOS 11.3 используйте эти команды:

- **mgmt модема csm отладка-rbs** - Для сигнала линии (Необходимо задать сервис, внутренний в режиме конфигурации сначала.).
- **debug csm voice** - Для межрегистровой отправки сигналов.
- **debug vtsp all**- Для имения выходных данных всех сообщений (цифры), которыми обмениваются между УАТС и маршрутизатором.

Для AS5400 и платформ AS5350, используйте эти отладки:

- **sigsm r2 отладки** - Для межрегистровой отправки сигналов
- **debug vtsp all**- Для имения выходных данных всех сообщений (цифры), которыми обмениваются между УАТС и маршрутизатором.

## [Пример результата отладки](#)

С тех пор существует три других конфигурации, ранее показанные в этом документе, вот три других отладки:

## [Digital Non-compelled R2: входящий вызов к 567](#)

Для понимания этих **выходных данных отладки** лучше, обратитесь к [Теории сигнализации E1 R2](#).

```
eefje#show debug CAS: Channel Associated Signaling debugging is on CSM Voice: Voice Call
Switching Module debugging is on Voice Telephony session debugging is on Voice Telephony dsp
debugging is on Voice Telephony error debugging is on eefje# eefje# eefje# Jan 6 10:41:28.677:
from NEAT(0): (0/0): Rx SEIZURE (ABCD=0001) Jan 6 10:41:28.717: VDEV_ALLOCATE: failed to
allocate a device Jan 6 10:41:28.717: VDEV_ALLOCATE: 1/28 is allocated Jan 6 10:41:28.721:
csm_vtsp_init_tdm (voice_vdev=0x620BF874) Jan 6 10:41:28.721: csm_vtsp_init_tdm:
dsprm_tdm_allocate: tdm slot 2, dspm 1, dsp 5, dsp_channel 1 Jan 6 10:41:28.721:
csm_vtsp_init_tdm: dsprm_tdm_allocate: tdm stream 5, channel 3, bank 1, bp_channel 4, BP_stream
255 Jan 6 10:41:28.721: CSM_RX_CAS_EVENT_FROM_NEAT:(cid0018): EVENT_CALL_DIAL_IN at slot 2 and
port 16 Jan 6 10:41:28.721: CSM_PROC_IDLE: CSM_EVENT_START_DIGIT_COLLECT at slot 2, port 16 Jan
6 10:41:28.721: csm_vtsp_start_digit_collect (voice_vdev=0x620BF874) Jan 6 10:41:28.721: Enter
csm_connect_pri_vdev function Jan 6 10:41:28.721: csm_connect_pri_vdev:tdm_allocate_BP_ts()call.
BP TS allocated at BP_stream0, BP_Ch28,vdev_common 0x6 20BF8E4 Jan 6 10:41:28.721: to
NEAT:(cid0018) EVENT_CHANNEL_LOCK for slot0 ctrl0 chan0 Jan 6 10:41:28.721:
vtsp_do_call_setup_ind Jan 6 10:41:28.721: vtsp_do_call_setup_ind: Call ID=65681, guid=61FAF610
Jan 6 10:41:28.721: vtsp_do_call_setup_ind: type=0, under_spec=0, name=, id0=0, id1=0, id2=0,
calling=, called= Jan 6 10:41:28.721: vtsp_do_call_setup_ind: redirect DN = reason =
0vtsp_open_voice_and_set_params Jan 6 10:41:28.721: dsp_close_voice_channel: [0:1:0]
packet_len=8 channel_id =8529 packet_id=75 Jan 6 10:41:28.721: dsp_open_voice_channel_20:
[0:1:0] packet_Len=16 channel_id =8529 packet_id=74 alaw_ulaw_select=1
associated_signaling_channel=0 time_slot=0 serial_port=0 Jan 6 10:41:28.721:
dsp_encap_config_20: [0:1:0] packet_Len=24 channel_id=8529 packet_id=92 TransportProtocol 2
t_ssrc=0x0 r_ssrc=0x0 t_vpxcc=0x0 r_vpxcc=0x0 Jan 6 10:41:28.721: dsp_set_playout: [0:1:0]
packet_Len=18 channel_id=8529 packet_id=76 mode=1 initial=60 min=4 max=200 fax_nom=300 Jan 6
10:41:28.721: dsp_echo_canceller_control: [0:1:0] packet_Len=10 channel_id=8529 packet_id=66
flags=0x0 Jan 6 10:41:28.721: dsp_set_gains: [0:1:0] packet_Len=12 channel_id=8529 packet_id=91
in_gain=0 out_gain=0 Jan 6 10:41:28.721: dsp_vad_enable: [0:1:0] packet_Len=10 channel_id=8529
packet_id=78 thresh=-38 Jan 6 10:41:28.721: dsp_voice_mode: [0:1:0] packet_Len=24
channel_id=8529 packet_id=73 coding_type=1 voice_field_size=80 V AD_flag=0 echo_length=64
```

comfort\_noise=1 inband\_detect=1 digit\_relay=2 AGC\_flag=0vtsp\_do\_r2\_start\_digit():  
dsp\_dtmf\_mode() dsp\_dtmf\_mode(VTSP\_TONE\_R2\_MF\_FORWARD\_MODE) Jan 6 10:41:28.725: dsp\_dtmf\_mode:  
[0:1:0] packet\_Len=10 channel\_id=8529 packet\_id=65  
dtmf\_or\_mf=1vtsp\_do\_r2\_start\_digit():fsm\_push(vtsp\_r2\_state\_table) Jan 6 10:41:28.725:  
csm\_vtsp\_call\_setup\_resp (vdev\_info=0x620BF874, vtsp\_cdb=0x621C5F3C) Jan 6 10:41:28.725:  
csm\_vtsp\_call\_setup\_resp:vdev\_common BP TS allocatedat BP\_stream0,BP\_Ch28 Jan 6 10:41:28.725:  
csm\_vtsp\_call\_setup\_resp:dst\_tdm\_chnl call. BP TS allocatedat stream 5, chan 3,BP\_stream 255,  
BP\_ch 4 Jan 6 10:41:28.725: csm\_vtsp\_call\_setup\_resp:DST\_tdm\_chnl call. BP TS allocatedat stream  
5, chan 3,BP\_stream 0, BP\_ch 28 Jan 6 10:41:28.725: CSM\_PROC\_IC1\_COLLECT\_ADDR\_INFO:  
CSM\_EVENT\_MODEM\_OFFHOOK (DNIS=, ANI=) at slot 2, port 16 Jan 6 10:41:28.725: R2 Incoming  
Voice(2/16): DSX (E1 0:0): STATE: R2\_IN\_IDLE R2 Got Event R2\_START Jan 6 10:41:28.821:  
CSM\_RX\_CAS\_EVENT\_FROM\_NEAT:(0018):EVENT\_START\_RX\_TONE at slot 2 and port 16 Jan 6 10:41:28.821:  
from NEAT(0): (0/0): TX SEIZURE\_ACK (ABCD=1101) !--- Digit 5 is sent: Forward Signal Group I-5.  
Jan 6 10:41:29.233: vtsp\_process\_dsp\_message: MSG\_TX\_DTMF\_DIGIT\_BEGIN: digit=5,  
rtp\_timestamp=0x0CA95D43 dc\_digit\_up Jan 6 10:41:29.233: csm\_vtsp\_digit\_ready\_up  
(vtsp\_cdb=0x621C5F3C) received digit (5) Jan 6 10:41:29.233: CSM voice (2/16): Rcvd Digit  
detected(5) Jan 6 10:41:29.233: R2 Incoming Voice(2/16): DSX (E1 0:0): STATE: R2\_IN\_COLLECT\_DNIS  
R2 Got Event 5 Jan 6 10:41:29.365: vtsp\_process\_dsp\_message: MSG\_TX\_DTMF\_DIGIT\_OFF: digit=5,  
duration=8321dc\_digit Jan 6 10:41:29.365: csm\_vtsp\_digit\_ready (vtsp\_cdb=0x621C5F3C) received  
digit (5) Jan 6 10:41:29.365: CSM voice (2/16): Rcvd Digit detected(5) Jan 6 10:41:29.365: R2  
Incoming Voice(2/16): DSX (E1 0:0): STATE:R2\_IN\_COLLECT\_DNIS R2 Got Event R2\_TONE\_OFF !--- Digit  
6 is sent: Forward Signal Group I-6. Jan 6 10:41:29.593: vtsp\_process\_dsp\_message:  
MSG\_TX\_DTMF\_DIGIT\_BEGIN: digit=6, rtp\_timestamp=0x0CA95D43 dc\_digit\_up Jan 6 10:41:29.593:  
csm\_vtsp\_digit\_ready\_up (vtsp\_cdb=0x621C5F3C) received digit (6) Jan 6 10:41:29.593: CSM voice  
(2/16): Rcvd Digit detected(6) Jan 6 10:41:29.593: R2 Incoming Voice(2/16): DSX (E1 0:0): STATE:  
R2\_IN\_COLLECT\_DNIS R2 Got Event 6 Jan 6 10:41:29.725: vtsp\_process\_dsp\_message:  
MSG\_TX\_DTMF\_DIGIT\_OFF: digit=6, duration=8321dc\_digit Jan 6 10:41:29.725: csm\_vtsp\_digit\_ready  
(vtsp\_cdb=0x621C5F3C) received digit (6) Jan 6 10:41:29.725: CSM voice (2/16): Rcvd Digit  
detected(6) Jan 6 10:41:29.725: R2 Incoming Voice(2/16): DSX (E1 0:0): STATE: R2\_IN\_COLLECT\_DNIS  
R2 Got Event R2\_TONE\_OFF !--- Digit 7 is sent: Forward Signal Group I-7. Jan 6 10:41:29.953:  
vtsp\_process\_dsp\_message: MSG\_TX\_DTMF\_DIGIT\_BEGIN: digit=7, rtp\_timestamp=0x0CA95D43 dc\_digit\_up  
Jan 6 10:41:29.953: csm\_vtsp\_digit\_ready\_up (vtsp\_cdb=0x621C5F3C) received digit (7) Jan 6  
10:41:29.953: CSM voice (2/16): Rcvd Digit detected(7) Jan 6 10:41:29.953: R2 Incoming  
Voice(2/16): DSX (E1 0:0): STATE:R2\_IN\_COLLECT\_DNIS R2 Got Event 7 Jan 6 10:41:30.085:  
vtsp\_process\_dsp\_message: MSG\_TX\_DTMF\_DIGIT\_OFF: digit=7, duration=8321dc\_digit Jan 6  
10:41:30.085: csm\_vtsp\_digit\_ready (vtsp\_cdb=0x621C5F3C)received digit (7) Jan 6 10:41:30.085:  
CSM voice (2/16): Rcvd Digit detected(7) Jan 6 10:41:30.085: R2 Incoming Voice(2/16): DSX (E1  
0:0): STATE: R2\_IN\_COLLECT\_DNIS R2 Got Event R2\_TONE\_OFF !--- Timeout: 3 seconds (default timer  
- AS5300 assumes DNIS is finished). Jan 6 10:41:32.953: R2 Incoming Voice(2/16): DSX (E1 0:0):  
STATE: R2\_IN\_COLLECT\_DNIS R2 Got Event R2\_TONE\_TIMER !--- Send digit 6: Backward Signal Group B-  
6 (subscriber's line free-charge). Jan 6 10:41:32.953: vtsp\_r2\_generate\_digits:  
vdev\_common=0x620BF8E4, string=567dc\_dial() vtsp\_dial\_nopush dsp\_dtmf\_dialing(): dial\_string =  
6# Jan 6 10:41:32.953: dsp\_dtmf\_dialing: [0:1:0] packet\_Len=36 channel\_id=8529 packet\_id=90  
string=6# digits=2, time\_on=150, time\_off=30 Jan 6 10:41:32.953:& digit=e, components=2,  
freq\_of\_first=900, freq\_of\_second=780, amp\_of\_first=8192, amp\_of\_second=8192 Jan 6 10:41:32.953:  
digit=o, components=2, freq\_of\_first=0, freq\_of\_second=0, amp\_of\_first=1, amp\_of\_second=1 Jan 6  
10:41:33.313: vtsp\_process\_dsp\_message: MSG\_TX\_DIALING\_DONE dc\_dialing\_done() Jan 6  
10:41:33.313: R2 Incoming Voice(2/16): DSX (E1 0:0): STATE:R2\_IN\_ANSWER\_PULSE R2 Got Event  
R2\_DIGITS\_GENR2\_ALERTING Jan 6 10:41:34.313: R2 Incoming Voice(2/16): DSX (E1 0:0): STATE:  
R2\_IN\_ANSWER\_PULSE R2 Got Event R2\_TONE\_TIMER Jan 6 10:41:34.313: R2\_IN\_IDLE:2 r2\_in\_connect  
called Jan 6 10:41:34.313: CSM\_PROC\_IC1\_COLLECT\_ADDR\_INFO: CSM\_EVENT\_ADDR\_INFO\_COLLECTED  
(DNIS=567, ANI=) at slot 2, port 16 Jan 6 10:41:34.313: vtsp\_tsp\_call\_accept\_check  
(sdb=0x61B8F0E0, calling\_number= called\_number=567): peer\_tag=0 Jan 6 10:41:34.313:  
VDEV\_ALLOCATE: failed to allocate a device Jan 6 10:41:34.313: VDEV\_ALLOCATE\_ALMOST\_READY:  
failed to allocate a non-idle modem Jan 6 10:41:34.313: VDEV\_ALLOCATE: failed to allocate a  
device Jan 6 10:41:34.313: VDEV\_ALLOCATE\_ALMOST\_READY: failed to allocate a non-idle modem Jan 6  
10:41:34.313: VDEV\_ALLOCATE: failed to allocate a device Jan 6 10:41:34.313:  
VDEV\_ALLOCATE\_ALMOST\_READY: failed to allocate a non-idle modem Jan 6 10:41:34.313:  
CSM\_PROC\_IC3\_WAIT\_FOR\_RES\_RESP: CSM\_EVENT\_RESOURCE\_OK at slot 2, port 16 Jan 6 10:41:34.313:  
vtsp\_ic\_switch : (voice\_vdev= 0x620BF874) Jan 6 10:41:34.313: vtsp\_tsp\_call\_switch\_ind  
(cdb=0x621C5F3C, tsp\_info=0x620BF874, calling\_number= called\_number=567 redir ect\_number=):  
peer\_tag=123dc\_switch: fsm\_pop() Jan 6 10:41:34.313: vtsp\_do\_call\_setup\_ind Jan 6 10:41:34.313:  
vtsp\_do\_call\_setup\_ind: Call ID=65683, guid=61FAF610 Jan 6 10:41:34.313: vtsp\_do\_call\_setup\_ind:  
type=0, under\_spec=0, name=ab^Lx, id0=1, id1=0, id2=0, calling=123, called=567 Jan 6



```
10:41:34.317: dsp_cp_tone_off: [] packet_Len=8 channel_id=8529 packet_id=71 Jan 6 10:41:34.317:
dsp_idle_mode: [] packet_Len=8 channel_id=8529 packet_id=68 Jan 6 10:41:34.317:
dsp_close_voice_channel: [] packet_Len=8 channel_id=8529 packet_id=75 Jan 6 10:41:34.317:
vtsp_timer_stop: 67475758 Jan 6 10:41:34.317: csm_vtsp_call_setup_resp (vdev_info=0x620BF874,
vtsp_cdb=0x621C5F3C) Jan 6 10:41:34.317: csm_vtsp_call_setup_resp:vdev_common BP TS allocatedat
BP_stream0, BP_Ch28 Jan 6 10:41:34.317: csm_vtsp_call_setup_resp:DST_tdm_chnl call. BP TS
allocatedat stream 5, chan 3,BP_stream 0, BP_ch 28 Jan 6 10:41:34.317:
csm_vtsp_call_setup_resp:DST_tdm_chnl call. BP TS allocatedat stream 5, chan 3,BP_stream 0,
BP_ch 28vt sp_open_voice_and_set_params Jan 6 10:41:34.317: dsp_close_voice_channel: [0:1 (54)]
packet_Len=8 channel_id=8529 packet_id=75 Jan 6 10:41:34.317: dsp_open_voice_channel_20: [0:1
(54)] packet_Len=16 channel_id=8529 packet_id=74 alaw_ulaw_select=1
associated_signaling_channel=0 time_slot=0 serial_port=0 Jan 6 10:41:34.317:
dsp_encap_config_20: [0:1 (54)] packet_Len=24 channel_id=8529 packet_id=92 TransportProtocol 2
t_ssrc=0x0 r_ssrc=0x0 t_vpxcc=0x0 r_vpxcc=0x0 Jan 6 10:41:34.317: dsp_set_payout: [0:1 (54)]
packet_Len=18 channel_id=8529 packet_id=76 mode=1 initial=60 min=4 max=200 fax_nom=300 Jan 6
10:41:34.317: dsp_echo_canceller_control: [0:1 (54)] packet_Len=10 channel_id=8529 packet_id=66
flags=0x0 Jan 6 10:41:34.317: dsp_set_gains: [0:1 (54)] packet_Len=12 channel_id=8529
packet_id=91 in_gain=0 out_gain=0 Jan 6 10:41:34.317: dsp_vad_enable: [0:1 (54)] packet_Len=10
channel_id=8529 packet_id=78 thresh=-38act_proceeding Jan 6 10:41:34.321:
csm_vtsp_call_proceeding:DST_tdm_chnl call. BP TS allocatedstream 5, chan 3,BP_stream 0, BP_ch
28act_alert Jan 6 10:41:34.345: vtsp_ring_noan_timer_start: 67475761 Jan 6 10:41:34.345:
csm_vtsp_call_alert (vtsp_cdb=0x621C5F3C)act_bridge act_caps_ind Jan 6 10:41:34.589:
act_caps_ind:Encap 1, Vad 2, Codec 0x4, CodecBytes 20, FaxRate 2, FaxBytes 20 SignalType 0
DtmfRelay 1, Modem lact_caps_ack Jan 6 10:41:34.589: dsp_idle_mode: [0:1 (54)] packet_Len=8
channel_id=8529 packet_id=68 Jan 6 10:41:34.589: act_caps_ack: codec = 15, ret = 1 Jan 6
10:41:34.589: dsp_cp_tone_off: [0:1 (54)] packet_Len=8 channel_id=8529 packet_id=71 Jan 6
10:41:34.589: dsp_idle_mode: [0:1 (54)] packet_Len=8 channel_id=8529 packet_id=68 Jan 6
10:41:34.589: dsp_encap_config_20: [0:1 (54)] packet_Len=24 channel_id=8529 packet_id=92
TransportProtocol 2 t_ssrc=0x0 r_ssrc=0x0 t_vpxcc=0x0 r_vpxcc=0x0 Jan 6 10:41:34.589:
dsp_voice_mode: [0:1 (54)] packet_Len=24 channel_id=8529 packet_id=73 coding_type=20
voice_field_size=20 VAD_flag=1 echo_length=64 comfort_noise=1 inband_detect=1 digit_relay=2
AGC_flag=0act_alert_connect Jan 6 10:41:36.857: vtsp_ring_noan_timer_stop: 67476012 Jan 6
10:41:36.857: dsp_cp_tone_off: [0:1 (54)] packet_Len=8 channel_id=8529 packet_id=71 Jan 6
10:41:36.857: csm_vtsp_call_connect (vtsp_cdb=0x621C5F3C, voice_vdev=0x620BF874) Jan 6
10:41:36.857: CSM_IC5_WAIT_FOR_SWITCH_OVER: CSM_EVENT_MODEM_OFFHOOK at slot 2, port 16 Jan 6
10:41:36.917: CSM_RX_CAS_EVENT_FROM_NEAT:(0018): EVENT_CHANNEL_CONNECTED at slot 2 and port 16
Jan 6 10:41:36.917: CSM_PROC_IC6_WAIT_FOR_CONNECT: CSM_EVENT_DSX0_CONNECTED at slot 2, port 16
Jan 6 10:41:36.921: from NEAT(0): (0/0): TX ANSWERED(ABCD=0101) eefje#
```

## [R2, цифровой полувынужденный: входящий вызов к 567](#)

Для понимания этих выходных данных отладки лучше, обратитесь к [Теории сигнализации E1 R2](#).

```
eefje#show debug CAS: Channel Associated Signaling debugging is on CSM Voice: Voice Call
Switching Module debugging is on Voice Telephony session debugging is on Voice Telephony dsp
debugging is on Voice Telephony error debugging is on eefje# eefje# eefje# Jan 6 09:53:42.389:
from NEAT(0): (0/2): Rx SEIZURE(ABCD=0001) Jan 6 09:53:42.433: VDEV_ALLOCATE: failed to allocate
a device Jan 6 09:53:42.433: VDEV_ALLOCATE: 1/27 is allocated Jan 6 09:53:42.433:
csm_vtsp_init_tdm (voice_vdev=0x620BF320) Jan 6 09:53:42.433: csm_vtsp_init_tdm:
dsprm_tdm_allocate: tdm slot 2, dsprm 1, dsp 4, dsp_channel 4 Jan 6 09:53:42.433:
csm_vtsp_init_tdm: dsprm_tdm_allocate: tdm stream 7, channel 0, bank 4, BP_channel 3, BP_stream
255 Jan 6 09:53:42.433: CSM_RX_CAS_EVENT_FROM_NEAT:(cid0017): EVENT_CALL_DIAL_IN at slot 2 and
port 15 Jan 6 09:53:42.433: CSM_PROC_IDLE: CSM_EVENT_START_DIGIT_COLLECT at slot 2, port 15 Jan
6 09:53:42.433: csm_vtsp_start_digit_collect (voice_vdev=0x620BF320) Jan 6 09:53:42.433: Enter
csm_connect_pri_vdev function Jan 6 09:53:42.433: csm_connect_pri_vdev:tdm_allocate_BP_Ts()call.
BP TS allocated at BP_stream0, BP_Ch27,vdev_common 0x6 20BF390 Jan 6 09:53:42.433: to
NEAT:(cid0017) EVENT_CHANNEL_LOCK for slot0 ctrl0 chan2 Jan 6 09:53:42.433:
vtsp_do_call_setup_ind Jan 6 09:53:42.433: vtsp_do_call_setup_ind: Call ID=65675, guid=61FAF610
Jan 6 09:53:42.433: vtsp_do_call_setup_ind: type=0, under_spec=0, name=, id0=0, id1=0, id2=0,
calling=, called= Jan 6 09:53:42.433: vtsp_do_call_setup_ind: redirect DN = reason =
0vtsp_open_voice_and_set_params Jan 6 09:53:42.433: dsp_close_voice_channel: [0:1:2]
packet_Len=8 channel_id=8516 packet_id=75 Jan 6 09:53:42.433: dsp_open_voice_channel_20: [0:1:2]
```

packet\_Len=16 channel\_id=8516 packet\_id=74 alaw\_ulaw\_select=1 associated\_signaling\_channel=0  
time\_slot=1 serial\_port=1 Jan 6 09:53:42.433: dsp\_encap\_config\_20: [0:1:2] packet\_Len=24  
channel\_id=8516 packet\_id=92 TransportProtocol 2 t\_ssrc=0x0 r\_ssrc=0x0 t\_vpxcc=0x0 r\_vpxcc=0x0  
Jan 6 09:53:42.433: dsp\_set\_payout: [0:1:2] packet\_Len=18 channel\_id=8516 packet\_id=76 mode=1  
initial=60 min=4 max=200 fax\_nom=300 Jan 6 09:53:42.433: dsp\_echo\_canceller\_control: [0:1:2]  
packet\_Len=10 channel\_id=8516 packet\_id=66 flags=0x0 Jan 6 09:53:42.437: dsp\_set\_gains:[0:1:2]  
packet\_Len=12 channel\_id=8516 packet\_id=91 in\_gain=0 out\_gain=0 Jan 6 09:53:42.437:  
dsp\_vad\_enable: [0:1:2] packet\_Len=10 channel\_id=8516 packet\_id=78 thresh=-38 Jan 6  
09:53:42.437: dsp\_voice\_mode: [0:1:2] packet\_Len=24 channel\_id=8516 packet\_id=73 coding\_type=1  
voice\_field\_size=80 VAD\_flag=0 echo\_length=64 comfort\_noise=1 inband\_detect=1 digit\_relay=2  
AGC\_flag=0vtsp\_do\_r2\_start\_digit(): dsp\_dtmf\_mode() dsp\_dtmf\_mode(VTSP\_TONE\_R2\_MF\_FORWARD\_MODE)  
Jan 6 09:53:42.437: dsp\_dtmf\_mode: [0:1:2] packet\_Len=10 channel\_id=8516 packet\_id=65  
dtmf\_or\_mf=1vtsp\_do\_r2\_start\_digit(): fsm\_push(vtsp\_r2\_state\_table) Jan 6 09:53:42.437:  
csm\_vtsp\_call\_setup\_resp (vdev\_info=0x620BF320, vtsp\_cdb=0x621C5F3C) Jan 6 09:53:42.437:  
csm\_vtsp\_call\_setup\_resp:vdev\_common BP TS allocatedat BP\_stream0, BP\_Ch27 Jan 6 09:53:42.437:  
csm\_vtsp\_call\_setup\_resp:DST\_tdm\_chnl call. BP TS allocatedat stream 7, chan 0,BP\_stream 255,  
BP\_ch 3 Jan 6 09:53:42.437: csm\_vtsp\_call\_setup\_resp:DST\_tdm\_chnl call. BP TS allocatedat stream  
7, chan 0,BP\_stream 0, BP\_ch 27 Jan 6 09:53:42.437: CSM\_PROC\_IC1\_COLLECT\_ADDR\_INFO:  
CSM\_EVENT\_MODEM\_OFFHOOK (DNIS=, ANI=) at slot 2, port 15 Jan 6 09:53:42.437: R2 Incoming  
Voice(2/15): DSX (E1 0:2): STATE:R2\_IN\_IDLE R2 Got Event R2\_START Jan 6 09:53:42.533:  
CSM\_RX\_CAS\_EVENT\_FROM\_NEAT:(0017):EVENT\_START\_RX\_TONE at slot 2 and port 15 Jan 6 09:53:42.533:  
from NEAT(0): (0/2): **TX SEIZURE ACK (ABCD=1101) !--- Digit 5 is sent: Forward Signal Group I-5.**  
Jan 6 09:53:42.641: vtsp\_process\_dsp\_message: MSG\_TX\_DTMF\_DIGIT\_BEGIN: digit=5,  
rtp\_timestamp=0x9330B42B dc\_digit\_up Jan 6 09:53:42.641: csm\_vtsp\_digit\_ready\_up  
(vtsp\_cdb=0x621C5F3C) received digit (5) Jan 6 09:53:42.641: CSM voice (2/15): Rcvd Digit  
detected(5) Jan 6 09:53:42.641: R2 Incoming Voice(2/15): DSX (E1 0:2): **STATE:R2\_IN\_COLLECT\_DNIS  
R2 Got Event 5 !--- Digit 1 sent (pulse): Backward Signal Group A-1 (Send next digit) !--- "#  
this indicates that it is a pulse).** Jan 6 09:53:42.641: vtsp\_r2\_generate\_digits:  
vdev\_common=0x620BF390, string=5dc\_dial() vtsp\_dial\_nopush **dsp\_dtmf\_dialing(): dial\_string = 1#**  
Jan 6 09:53:42.641: dsp\_dtmf\_dialing: [0:1:2] packet\_Len=36 channel\_id=8516 packet\_id=90  
string=1# digits=2, time\_on=150, time\_off=30 Jan 6 09:53:42.641: digit=` , components=2,  
freq\_of\_first=1020, freq\_of\_second=1140, amp\_of\_first=8192, amp\_of\_second=8192 Jan 6  
09:53:42.641: digit=o, components=2, freq\_of\_first=0, freq\_of\_second=0, amp\_of\_first=1,  
amp\_of\_second=1 Jan 6 09:53:42.741: vtsp\_process\_dsp\_message: MSG\_TX\_DTMF\_DIGIT\_OFF: digit=5,  
duration=8291dc\_digit Jan 6 09:53:42.741: csm\_vtsp\_digit\_ready (vtsp\_cdb=0x621C5F3C) received  
digit (5) Jan 6 09:53:42.741: CSM voice (2/15): Rcvd Digit detected(5) Jan 6 09:53:42.741: R2  
Incoming Voice(2/15): DSX (E1 0:2): **STATE:R2\_IN\_COLLECT\_DNIS R2 Got Event R2\_TONE\_OFF !--- Digit  
6 is sent: Forward Signal Group I.** Jan 6 09:53:42.881: vtsp\_process\_dsp\_message:  
MSG\_TX\_DTMF\_DIGIT\_BEGIN: digit=6, rtp\_timestamp=0x9330B42B dc\_digit\_up Jan 6 09:53:42.881:  
csm\_vtsp\_digit\_ready\_up (vtsp\_cdb=0x621C5F3C)received digit (6) Jan 6 09:53:42.881: CSM voice  
(2/15): Rcvd Digit detected(6) Jan 6 09:53:42.881: R2 Incoming Voice(2/15): DSX (E1 0:2):  
STATE:R2\_IN\_COLLECT\_DNIS R2 **Got Event 6 !--- Digit 1 sent (pulse): Backward Signal Group A-1.  
(Send next digit.)** Jan 6 09:53:42.881: vtsp\_r2\_generate\_digits: vdev\_common=0x620BF390,  
string=56dc\_dial() vtsp\_dial\_nopush **dsp\_dtmf\_dialing(): dial\_string = 1#** Jan 6 09:53:42.881:  
dsp\_dtmf\_dialing: [0:1:2] packet\_Len=36 channel\_id=8516 packet\_id=90 string=1# digits=2,  
time\_on=150, time\_off=30 Jan 6 09:53:42.881: digit=` , components=2, freq\_of\_first=1020,  
freq\_of\_second=1140, amp\_of\_first=8192, amp\_of\_second=8192 Jan 6 09:53:42.881: digit=o,  
components=2, freq\_of\_first=0, freq\_of\_second=0, amp\_of\_first=1, amp\_of\_second=1 Jan 6  
09:53:42.981: vtsp\_process\_dsp\_message: MSG\_TX\_DTMF\_DIGIT\_OFF: digit=6, duration=8291dc\_digit  
Jan 6 09:53:42.981: csm\_vtsp\_digit\_ready (vtsp\_cdb=0x621C5F3C) received digit (6) Jan 6  
09:53:42.981: CSM voice (2/15): Rcvd Digit detected(6) Jan 6 09:53:42.981: R2 Incoming  
Voice(2/15): DSX (E1 0:2): **STATE:R2\_IN\_COLLECT\_DNIS R2 Got Event R2\_TONE\_OFF !--- Digit 7 is  
sent: Forward Signal Group I-7.** Jan 6 09:53:43.121: vtsp\_process\_dsp\_message:  
**MSG\_TX\_DTMF\_DIGIT\_BEGIN: digit=7, rtp\_timestamp=0x9330B42B dc\_digit\_up** Jan 6 09:53:43.121:  
csm\_vtsp\_digit\_ready\_up (vtsp\_cdb=0x621C5F3C)received digit (7) Jan 6 09:53:43.121: CSM voice  
(2/15): Rcvd Digit detected(7) Jan 6 09:53:43.121: R2 Incoming Voice(2/15): DSX (E1 0:2):  
STATE:R2\_IN\_COLLECT\_DNIS R2 **Got Event 7 !--- Send digit 1 (pulse): Backward Signal Group A-1.**  
Jan 6 09:53:43.121: vtsp\_r2\_generate\_digits: vdev\_common=0x620BF390, string=567dc\_dial()  
vtsp\_dial\_nopush **dsp\_dtmf\_dialing(): dial\_string = 1#** Jan 6 09:53:43.121: dsp\_dtmf\_dialing:  
[0:1:2] packet\_Len=36 channel\_id=8516 packet\_id=90 string=1# digits=2, time\_on=150, time\_off=30  
Jan 6 09:53:43.121: digit=` , components=2, freq\_of\_first=1020, freq\_of\_second=1140,  
amp\_of\_first=8192, amp\_of\_second=8192 Jan 6 09:53:43.121: digit=o, components=2,  
freq\_of\_first=0, freq\_of\_second=0, amp\_of\_first=1, amp\_of\_second=1 Jan 6 09:53:43.221:  
vtsp\_process\_dsp\_message: MSG\_TX\_DTMF\_DIGIT\_OFF: digit=7, duration=8291dc\_digit Jan 6

09:53:43.221: csm\_vtsp\_digit\_ready (vtsp\_cdb=0x621C5F3C) received digit (7) Jan 6 09:53:43.221: CSM voice (2/15): Rcvd Digit detected(7) Jan 6 09:53:43.221: R2 Incoming Voice(2/15): DSX (E1 0:2): **STATE:R2\_IN\_COLLECT\_DNIS R2 Got Event R2\_TONE\_OFF** Jan 6 09:53:43.489: vtsp\_process\_dsp\_message: MSG\_TX\_DIALING\_DONEdc\_dialing\_done() *!--- Timeout is 3 seconds.* Jan 6 09:53:46.121: R2 Incoming Voice(2/15): DSX (E1 0:2): **STATE:R2\_IN\_COLLECT\_DNIS R2 Got Event R2\_TONE\_TIMER** *!--- Digit 3 sent(pulse): Backward Signal Group A-3. !--- (Address-complete, changeover to reception of Group-B signals).* Jan 6 09:53:46.121: vtsp\_r2\_generate\_digits: vdev\_common=0x620BF390, string=567dc\_dial() vtsp\_dial\_nopush dsp\_dtmf\_dialing(): dial\_string = 3# Jan 6 09:53:46.121: dsp\_dtmf\_dialing: [0:1:2] packet\_Len=36 channel\_id=8516 packet\_id=90 string=3# digits=2, time\_on=150, time\_off=30 Jan 6 09:53:46.121: digit=b, components=2, freq\_of\_first=1020, freq\_of\_second=900, amp\_of\_first=8192, amp\_of\_second=8192 Jan 6 09:53:46.121: digit=o, components=2, freq\_of\_first=0, freq\_of\_second=0, amp\_of\_first=1, amp\_of\_second=1 *!--- Digit 1 is sent: Forward Signal Group II-1 !--- (subscriber without priority).* Jan 6 09:53:46.361: vtsp\_process\_dsp\_message: **MSG\_TX\_DTMF\_DIGIT\_BEGIN: digit=1,** rtp\_timestamp=0x9330B42B dc\_digit\_up Jan 6 09:53:46.361: csm\_vtsp\_digit\_ready\_up (vtsp\_cdb=0x621C5F3C) received digit (1) Jan 6 09:53:46.361: CSM voice (2/15): Rcvd Digit detected(1) Jan 6 09:53:46.361: R2 Incoming Voice(2/15): DSX (E1 0:2): **STATE:R2\_IN\_CATEGORY R2 Got Event 1** Jan 6 09:53:46.361: r2\_comp\_category:R2\_ALERTING *!--- Digit 6 sent (pulse): Backward Signal Group B-6 !--- (the subscriber line free of charge).* Jan 6 09:53:46.361: vtsp\_r2\_generate\_digits: vdev\_common=0x620BF390, string=567dc\_dial() vtsp\_dial\_nopush **dsp\_dtmf\_dialing(): dial\_string = 6#** Jan 6 09:53:46.361: dsp\_dtmf\_dialing: [0:1:2] packet\_Len=36 channel\_id=8516 packet\_id=90 string=6# digits=2, time\_on=150, time\_off=30 Jan 6 09:53:46.361: digit=e, components=2, freq\_of\_first=900, freq\_of\_second=780, amp\_of\_first=8192, amp\_of\_second=8192 Jan 6 09:53:46.361: digit=o, components=2, freq\_of\_first=0, freq\_of\_second=0, amp\_of\_first=1, amp\_of\_second=1 Jan 6 09:53:46.461: vtsp\_process\_dsp\_message: **MSG\_TX\_DTMF\_DIGIT\_OFF:digit=1, duration=8291dc\_digit** Jan 6 09:53:46.461: csm\_vtsp\_digit\_ready (vtsp\_cdb=0x621C5F3C)received digit (1) Jan 6 09:53:46.461: CSM voice (2/15): Rcvd Digit detected(1) Jan 6 09:53:46.461: R2 Incoming Voice(2/15): DSX (E1 0:2): **STATE:R2\_IN\_COMPLETE R2 Got Event R2\_TONE\_OFF** Jan 6 09:53:46.729: vtsp\_process\_dsp\_message: **MSG\_TX\_DIALING\_DONEdc\_dialing\_done()** Jan 6 09:53:47.461: R2 Incoming Voice(2/15): DSX (E1 0:2): **STATE:R2\_IN\_WAIT\_GUARD R2 Got Event R2\_TONE\_TIMER** Jan 6 09:53:47.461: R2\_IN\_IDLE:2 r2\_in\_connect called Jan 6 09:53:47.461: CSM\_PROC\_IC1\_COLLECT\_ADDR\_INFO: CSM\_EVENT\_ADDR\_INFO\_COLLECTED (DNIS=567, ANI=) at slot 2, port 15 Jan 6 09:53:47.461: vtsp\_tsp\_call\_accept\_check (sdb=0x61B8F0E0,calling\_number= called\_number=567): peer\_tag=0 Jan 6 09:53:47.461: VDEV\_ALLOCATE: failed to allocate a device Jan 6 09:53:47.461: VDEV\_ALLOCATE\_ALMOST\_READY: failed to allocate a non-idle modem Jan 6 09:53:47.461: VDEV\_ALLOCATE: failed to allocate a device Jan 6 09:53:47.461: VDEV\_ALLOCATE\_ALMOST\_READY: failed to allocate a non-idle modem Jan 6 09:53:47.461: VDEV\_ALLOCATE: failed to allocate a device Jan 6 09:53:47.461: VDEV\_ALLOCATE\_ALMOST\_READY: failed to allocate a non-idle modem Jan 6 09:53:47.461: CSM\_PROC\_IC3\_WAIT\_FOR\_RES\_RESP: CSM\_EVENT\_RESOURCE\_OK at slot 2, port 15 Jan 6 09:53:47.461: vtsp\_IC\_switch : (voice\_vdev= 0x620BF320) Jan 6 09:53:47.461: vtsp\_tsp\_call\_switch\_ind (cdb=0x621C5F3C,tsp\_info=0x620BF320, calling\_number= called\_number=567 redirect\_number=): peer\_tag=123dc\_switch: fsm\_pop() Jan 6 09:53:47.461: vtsp\_do\_call\_setup\_ind Jan 6 09:53:47.461: vtsp\_do\_call\_setup\_ind: Call ID=65677, guid=61FAF610 Jan 6 09:53:47.461: vtsp\_do\_call\_setup\_ind: type=0, under\_spec=0, name=AB^Lo, id0=3, id1=0, id2=0, calling=123, called=567 Jan 6 09:53:47.465: dsp\_cp\_tone\_off: [] packet\_Len=8 channel\_id=8516 packet\_id=71 Jan 6 09:53:47.465: dsp\_idle\_mode: [] packet\_Len=8 channel\_id=8516 packet\_id=68 Jan 6 09:53:47.465: dsp\_close\_voice\_channel: [] packet\_Len=8 channel\_id=8516 packet\_id=75 Jan 6 09:53:47.465: vtsp\_timer\_stop: 67189073 Jan 6 09:53:47.465: csm\_vtsp\_call\_setup\_resp (vdev\_info=0x620BF320, vtsp\_cdb=0x621C5F3C) Jan 6 09:53:47.465: csm\_vtsp\_call\_setup\_resp:vdev\_common BP TS allocatedat BP\_stream0, BP\_Ch27 Jan 6 09:53:47.465: csm\_vtsp\_call\_setup\_resp:DST\_tdm\_chnl call. BP TS allocatedat stream 7, chan 0,BP\_stream 0, BP\_ch 27 Jan 6 09:53:47.465: csm\_vtsp\_call\_setup\_resp:DST\_tdm\_chnl call. BP TS allocatedat stream 7, chan 0,BP\_stream 0, BP\_ch 27vtsp\_open\_voice\_and\_set\_params Jan 6 09:53:47.465: dsp\_close\_voice\_channel: [0:1 (52)] packet\_Len=8 channel\_id=8516 packet\_id=75 Jan 6 09:53:47.465: dsp\_open\_voice\_channel\_20: [0:1 (52)] packet\_Len=16 channel\_id=8516 packet\_id=74 alaw\_ulaw\_select=1 associated\_signaling\_channel=0 time\_slot=1 serial\_port=1 Jan 6 09:53:47.465: dsp\_encap\_config\_20: [0:1 (52)] packet\_Len=24 channel\_id=8516 packet\_id=92 TransportProtocol 2 t\_ssrc=0x0 r\_ssrc=0x0 t\_vpxcc=0x0 r\_vpxcc=0x0 Jan 6 09:53:47.465: dsp\_set\_playout: [0:1 (52)] packet\_Len=18 channel\_id=8516 packet\_id=76 mode=1 initial=60 min=4 max=200 fax\_nom=300 Jan 6 09:53:47.465: dsp\_echo\_canceller\_control: [0:1 (52)] packet\_Len=10 channel\_id=8516 packet\_id=66 flags=0x0 Jan 6 09:53:47.465: dsp\_set\_gains: [0:1 (52)] packet\_Len=12 channel\_id=8516 packet\_id=91 in\_gain=0 out\_gain=0 Jan 6 09:53:47.465: dsp\_vad\_enable: [0:1 (52)] packet\_Len=10 channel\_id=8516 packet\_id=78 thresh=-38act\_proceeding Jan 6 09:53:47.469:

csm\_vtsp\_call\_proceeding:DST\_tdm\_chnl call. BP TS allocated stream 7, chan 0, BP\_stream 0, BP\_ch 27  
act\_alert Jan 6 09:53:47.493: vtsp\_ring\_noan\_timer\_start: 67189076 Jan 6 09:53:47.493:  
csm\_vtsp\_call\_alert (vtsp\_cdb=0x621C5F3C) act\_bridge act\_caps\_ind Jan 6 09:53:47.737:  
act\_caps\_ind:Encap 1, Vad 2, Codec 0x4, CodecBytes 20, FaxRate 2, FaxBytes 20 SignalType 0  
DtmfRelay 1, Modem lact\_caps\_ack Jan 6 09:53:47.737: dsp\_idle\_mode: [0:1 (52)] packet\_Len=8  
channel\_id=8516 packet\_id=68 Jan 6 09:53:47.737: act\_caps\_ack: codec = 15, ret = 1 Jan 6  
09:53:47.737: dsp\_cp\_tone\_off: [0:1 (52)] packet\_Len=8 channel\_id=8516 packet\_id=71 Jan 6  
09:53:47.737: dsp\_idle\_mode: [0:1 (52)] packet\_Len=8 channel\_id=8516 packet\_id=68 Jan 6  
09:53:47.737: dsp\_encap\_config\_20: [0:1 (52)] packet\_Len=24 channel\_id=8516 packet\_id=92  
TransportProtocol 2 t\_src=0x0 r\_src=0x0 t\_vpxcc=0x0 r\_vpxcc=0x0 Jan 6 09:53:47.737:  
dsp\_voice\_mode: [0:1 (52)] packet\_Len=24 channel\_id=8516 packet\_id=73 coding\_type=20  
voice\_field\_size= 20 VAD\_flag=1 echo\_length=64 comfort\_noise=1 inband\_detect=1 digit\_relay=2  
AGC\_flag=0 act\_alert\_connect Jan 6 09:53:49.461: vtsp\_ring\_noan\_timer\_stop: 67189273 Jan 6  
09:53:49.461: dsp\_cp\_tone\_off: [0:1 (52)] packet\_Len=8 channel\_id=8516 packet\_id=71 Jan 6  
09:53:49.461: csm\_vtsp\_call\_connect (vtsp\_cdb=0x621C5F3C, voice\_vdev=0x620BF320) Jan 6  
09:53:49.461: CSM\_IC5\_WAIT\_FOR\_SWITCH\_OVER: CSM\_EVENT\_MODEM\_OFFHOOK at slot 2, port 15 Jan 6  
09:53:49.617: CSM\_RX\_CAS\_EVENT\_FROM\_NEAT:(0017): EVENT\_CHANNEL\_CONNECTED at slot 2 and port 15  
Jan 6 09:53:49.617: CSM\_PROC\_IC6\_WAIT\_FOR\_CONNECT: CSM\_EVENT\_DSX0\_CONNECTED at slot 2, port 15  
Jan 6 09:53:49.621: from NEAT(0): (0/2): **TX ANSWERED**(ABCD=0101) eefje# eefje#

## R2 цифровой вынужденный ANI: входящий вызов к 567

Для понимания этих выходных данных отладки лучше, обратитесь к [Теории сигнализации E1 R2](#).

eefje#**debug csm voice** Voice Call Switching Module debugging is on eefje#**debug cas** Channel  
Associated Signaling debugging is on Jan 7 10:00:02.907: from NEAT(0): debug-cas is on Jan 7  
10:00:02.907: from NEAT(0): special debug-cas is off vtsp all Voice telephony call control all  
debugging is on eefje# eefje# Jan 7 10:00:23.883: from NEAT(0): (0/8): **Rx SEIZURE** (ABCD=0001)  
Jan 7 10:00:23.927: VDEV\_ALLOCATE: failed to allocate a device Jan 7 10:00:23.927:  
VDEV\_ALLOCATE: 1/2 is allocated Jan 7 10:00:23.927: csm\_vtsp\_init\_tdm (voice\_vdev=0x61F19688)  
Jan 7 10:00:23.927: csm\_vtsp\_init\_tdm: dsprm\_tdm\_allocate: tdm slot 1, dspm 3, dsp 4,  
dsp\_channel 1 Jan 7 10:00:23.927: csm\_vtsp\_init\_tdm: dsprm\_tdm\_allocate: tdm stream 5, channel  
13, bank 0, BP\_channel 15, BP\_stream 255 Jan 7 10:00:23.927:  
CSM\_RX\_CAS\_EVENT\_FROM\_NEAT:(cid0007): EVENT\_CALL\_DIAL\_IN at slot 1 and port 60 Jan 7  
10:00:23.927: CSM\_PROC\_IDLE: CSM\_EVENT\_START\_DIGIT\_COLLECT at slot 1, port 60 Jan 7  
10:00:23.927: csm\_vtsp\_start\_digit\_collect (voice\_vdev=0x61F19688) Jan 7 10:00:23.927: Enter  
csm\_connect\_pri\_vdev function Jan 7 10:00:23.927: csm\_connect\_pri\_vdev:tdm\_allocate\_BP\_Ts()  
call. BP TS allocated at BP\_stream0, BP\_Ch8,vdev\_common 0x6205E5F8 Jan 7 10:00:23.927: to  
NEAT:(cid0007) EVENT\_CHANNEL\_LOCK for slot0 ctrl0 chan8 Jan 7 10:00:23.927:  
vtsp\_do\_call\_setup\_ind Jan 7 10:00:23.927: vtsp\_do\_call\_setup\_ind: Call ID=65579, guid=62031A88  
Jan 7 10:00:23.927: vtsp\_do\_call\_setup\_ind: type=0, under\_spec=0, name=, id0=0, id1=0, id2=0,  
calling=, called= Jan 7 10:00:23.927: vtsp\_do\_call\_setup\_ind: redirect DN = reason =  
0 vtsp\_do\_r2\_start\_digit(): fsm\_push(vtsp\_r2\_state\_table) Jan 7 10:00:23.927:  
csm\_vtsp\_call\_setup\_resp (vdev\_info=0x61F19688, vtsp\_cdb=0x61B5BFF8) Jan 7 10:00:23.927:  
csm\_vtsp\_call\_setup\_resp:vdev\_common BP TS allocated at BP\_stream0, BP\_Ch8 Jan 7 10:00:23.927:  
csm\_vtsp\_call\_setup\_resp:DST\_tdm\_chnl call. BP TS allocated at stream 5, chan 13, BP\_stream 255,  
BP\_ch 15 Jan 7 10:00:23.927: csm\_vtsp\_call\_setup\_resp:DST\_tdm\_chnl call. BP TS allocated at  
stream 5, chan 13, BP\_stream 0, BP\_ch 8 Jan 7 10:00:23.927: CSM\_PROC\_IC1\_COLLECT\_ADDR\_INFO:  
CSM\_EVENT\_MODEM\_OFFHOOK (DNIS=, ANI=) at slot 1, port 60 Jan 7 10:00:23.931: R2 Incoming  
Voice(1/60): DSX (E1 0:8): STATE: R2\_IN\_IDLE R2 Got Event R2\_START Jan 7 10:00:24.027:  
CSM\_RX\_CAS\_EVENT\_FROM\_NEAT:(0007): EVENT\_START\_RX\_TONE at slot 1 and port 60 Jan 7 10:00:24.027:  
from NEAT(0): (0/8): **TX SEIZURE ACK** (ABCD=1101) dc\_init\_dsp vtsp\_open\_voice\_and\_set\_params Jan 7  
10:00:24.151: dsp\_close\_voice\_channel: [0:1:8] packet\_Len=8 channel\_id=4929 packet\_id=75 Jan 7  
10:00:24.151: dsp\_open\_voice\_channel\_20: [0:1:8] packet\_Len=16 channel\_id=4929 packet\_id=74  
alaw\_ulaw\_select=1 associated\_signaling\_channel=0 time\_slot=0 serial\_port=0 Jan 7 10:00:24.151:  
dsp\_encap\_config\_20: [0:1:8] packet\_Len=24 channel\_id=4929 packet\_id=92 TransportProtocol 2  
t\_src=0x0 r\_src=0x0 t\_vpxcc=0x0 r\_vpxcc=0x0 Jan 7 10:00:24.151: dsp\_set\_payout: [0:1:8]  
packet\_Len=18 channel\_id=4929 packet\_id=76 mode=1 initial=60 min=4 max=200 fax\_nom=300 Jan 7  
10:00:24.151: dsp\_echo\_canceller\_control: [0:1:8] packet\_Len=10 channel\_id=4929 packet\_id=66  
flags=0x0 Jan 7 10:00:24.151: dsp\_set\_gains: [0:1:8] packet\_Len=12 channel\_id=4929 packet\_id=91  
in\_gain=0 out\_gain=0 Jan 7 10:00:24.151: dsp\_vad\_enable: [0:1:8] packet\_Len=10 channel\_id=4929  
packet\_id=78 thresh=-38 Jan 7 10:00:24.151: dsp\_voice\_mode: [0:1:8] packet\_Len=24

channel\_id=4929 packet\_id=73 coding\_type=1 voice\_field\_size=80 VAD\_flag=0 echo\_length=64  
comfort\_noise=1 inband\_detect=1 digit\_relay=2 AGC\_flag=0dsp\_dtmf\_mode  
(VTSP\_TONE\_R2\_MF\_FORWARD\_MODE) Jan 7 10:00:24.151: dsp\_dtmf\_mode: [0:1:8] packet\_Len=10  
channel\_id=4929 packet\_id=65dtmf\_or\_mf=1 **!--- Digit 5 is sent: Forward Signal Group I-5 (First  
DNIS digit).** Jan 7 10:00:24.203: vtsp\_process\_dsp\_message: **MSG\_TX\_DTMF\_DIGIT\_BEGIN: digit=5,**  
rtp\_timestamp=0x04030000 dc\_digit\_up Jan 7 10:00:24.203: csm\_vtsp\_digit\_ready\_up  
(vtsp\_cdb=0x61B5BFF8)received digit (5) Jan 7 10:00:24.203: CSM voice (1/60): Rcvd Digit  
detected(5) Jan 7 10:00:24.203: R2 Incoming Voice(1/60): DSX (E1 0:8): **STATE:R2\_IN\_PRE\_CALLERID  
R2 Got Event 5 !--- Send Backward Signal Group A-5 (caller category request).** Jan 7  
10:00:24.203: vtsp\_r2\_generate\_digits: vdev\_common=0x6205E5F8, string=5dc\_dial()vtsp\_dial\_nopush  
**dsp\_dtmf\_dialing(): dial\_string = 5** Jan 7 10:00:24.203: dsp\_dtmf\_dialing: [0:1:8] packet\_Len=24  
channel\_id=4929packet\_id=90 string=5 digits=1, time\_on=65435, time\_off=30 Jan 7 10:00:24.203:  
digit=, components=2, freq\_of\_first=1020, freq\_of\_second=780, amp\_of\_first=8192,  
amp\_of\_second=8192 Jan 7 10:00:24.303: vtsp\_process\_dsp\_message: MSG\_TX\_DTMF\_DIGIT\_OFF:digit=5,  
duration=30dc\_digit Jan 7 10:00:24.303: csm\_vtsp\_digit\_ready (vtsp\_cdb=0x61B5BFF8) received  
digit (5) Jan 7 10:00:24.303: CSM voice (1/60): Rcvd Digit detected(5) Jan 7 10:00:24.303: R2  
Incoming Voice(1/60): DSX (E1 0:8): **STATE:R2\_IN\_CALLERID R2 Got Event R2\_TONE\_OFF** Jan 7  
10:00:24.303: vtsp\_r2\_generate\_digits: vdev\_common=0x6205E5F8, string=5dc\_dial()  
vtsp\_dial\_nopush dsp\_dtmf\_dialing(): dial\_string = # Jan 7 10:00:24.303: dsp\_dtmf\_dialing:  
[0:1:8] packet\_Len=24 channel\_id=4929 packet\_id=90 string=# digits=1, time\_on=150, time\_off=30  
Jan 7 10:00:24.303: digit=, components=2, freq\_of\_first=0, freq\_of\_second=0, amp\_of\_first=1,  
amp\_of\_second=1 **!--- Caller Category Forward Signal Group II-1 is sent.** Jan 7 10:00:24.403:  
vtsp\_process\_dsp\_message: **MSG\_TX\_DTMF\_DIGIT\_BEGIN: digit=1,** rtp\_timestamp=0x001E0010 dc\_digit\_up  
Jan 7 10:00:24.403: csm\_vtsp\_digit\_ready\_up (vtsp\_cdb=0x61B5BFF8)received digit (1) Jan 7  
10:00:24.403: CSM voice (1/60): Rcvd Digit detected(1) Jan 7 10:00:24.403: R2 Incoming  
Voice(1/60): DSX (E1 0:8): **STATE:R2\_IN\_CALLERID R2 Got Event 1 !--- Send Backward Signal Group  
A-5 (Caller ID request).** Jan 7 10:00:24.403: vtsp\_r2\_generate\_digits: vdev\_common=0x6205E5F8,  
string=5dc\_dial() vtsp\_dial\_nopush **dsp\_dtmf\_dialing(): dial\_string = 5** Jan 7 10:00:24.403:  
dsp\_dtmf\_dialing: [0:1:8] packet\_Len=24 channel\_id=4929 packet\_id=90 string=5 digits=1,  
time\_on=65435, time\_off=30 Jan 7 10:00:24.403: digit=, components=2, freq\_of\_first=1020,  
freq\_of\_second=780, amp\_of\_first=8192, amp\_of\_second=8192 Jan 7 10:00:24.503:  
vtsp\_process\_dsp\_message: MSG\_TX\_DTMF\_DIGIT\_OFF: digit=1, duration=30dc\_digit Jan 7  
10:00:24.503: csm\_vtsp\_digit\_ready (vtsp\_cdb=0x61B5BFF8) received digit (1) Jan 7 10:00:24.503:  
CSM voice (1/60): Rcvd Digit detected(1) Jan 7 10:00:24.503: R2 Incoming Voice(1/60): DSX (E1  
0:8): **STATE:R2\_IN\_CALLERID R2 Got Event R2\_TONE\_OFF** Jan 7 10:00:24.503: vtsp\_r2\_generate\_digits:  
vdev\_common=0x6205E5F8, string=5dc\_dial() vtsp\_dial\_nopush dsp\_dtmf\_dialing(): dial\_string = #  
Jan 7 10:00:24.503: dsp\_dtmf\_dialing: [0:1:8] packet\_Len=24 channel\_id=4929 packet\_id=90  
string=# digits=1, time\_on=150, time\_off=30 Jan 7 10:00:24.503: digit=, components=2,  
freq\_of\_first=0, freq\_of\_second=0, amp\_of\_first=1, amp\_of\_second=1 **!--- First ANI digit is sent:  
Forward Signal Group I-1.** Jan 7 10:00:24.603: vtsp\_process\_dsp\_message: **MSG\_TX\_DTMF\_DIGIT\_BEGIN:  
digit=1,** rtp\_timestamp=0x001E0010 dc\_digit\_up Jan 7 10:00:24.603: csm\_vtsp\_digit\_ready\_up  
(vtsp\_cdb=0x61B5BFF8) received digit (1) Jan 7 10:00:24.603: CSM voice (1/60): Rcvd Digit  
detected(1) Jan 7 10:00:24.603: R2 Incoming Voice(1/60): DSX (E1 0:8): **STATE:R2\_IN\_CALLERID R2  
Got Event 1 !--- Send Backward Signal Group A-5 (Caller ID request).** Jan 7 10:00:24.603:  
vtsp\_r2\_generate\_digits: vdev\_common=0x6205E5F8, string=5dc\_dial()vtsp\_dial\_nopush  
**dsp\_dtmf\_dialing(): dial\_string = 5** Jan 7 10:00:24.603: dsp\_dtmf\_dialing: [0:1:8] packet\_Len=24  
channel\_id=4929 packet\_id=90 string=5 digits=1, time\_on=65435, time\_off=30 Jan 7 10:00:24.603:  
digit=, components=2, freq\_of\_first=1020, freq\_of\_second=780, amp\_of\_first=8192,  
amp\_of\_second=8192 Jan 7 10:00:24.703: vtsp\_process\_dsp\_message: MSG\_TX\_DTMF\_DIGIT\_OFF: digit=1,  
duration=30dc\_digit Jan 7 10:00:24.703: csm\_vtsp\_digit\_ready (vtsp\_cdb=0x61B5BFF8) received  
digit (1) Jan 7 10:00:24.703: CSM voice (1/60): Rcvd Digit detected(1) Jan 7 10:00:24.703: R2  
Incoming Voice(1/60): DSX (E1 0:8): **STATE:R2\_IN\_CALLERID R2 Got Event R2\_TONE\_OFF** Jan 7  
10:00:24.703: vtsp\_r2\_generate\_digits: vdev\_common=0x6205E5F8, string=5dc\_dial()vtsp\_dial\_nopush  
dsp\_dtmf\_dialing(): dial\_string = # Jan 7 10:00:24.703: dsp\_dtmf\_dialing: [0:1:8] packet\_Len=24  
channel\_id=4929 packet\_id=90 string=# digits=1, time\_on=150, time\_off=30 Jan 7 10:00:24.703:  
digit=, components=2, freq\_of\_first=0, freq\_of\_second=0, amp\_of\_first=1, amp\_of\_second=1 **!---  
Second ANI digit is sent: Forward Signal Group I-2.** Jan 7 10:00:24.803:  
vtsp\_process\_dsp\_message: **MSG\_TX\_DTMF\_DIGIT\_BEGIN:digit=2,** rtp\_timestamp=0x001E0010 dc\_digit\_up  
Jan 7 10:00:24.803: csm\_vtsp\_digit\_ready\_up (vtsp\_cdb=0x61B5BFF8) received digit (2) Jan 7  
10:00:24.803: CSM voice (1/60): Rcvd Digit detected(2) Jan 7 10:00:24.803: R2 Incoming  
Voice(1/60): DSX (E1 0:8): **STATE:R2\_IN\_CALLERID R2 Got Event 2 !--- Send Backward Signal Group  
A-5 (Caller ID request).** Jan 7 10:00:24.803: vtsp\_r2\_generate\_digits: vdev\_common=0x6205E5F8,  
string=5dc\_dial()vtsp\_dial\_nopush **dsp\_dtmf\_dialing(): dial\_string = 5** Jan 7 10:00:24.803:  
dsp\_dtmf\_dialing: [0:1:8] packet\_Len=24 channel\_id=4929packet\_id=90 string=5 digits=1,

time\_on=65435, time\_off=30 Jan 7 10:00:24.803: digit=, components=2, freq\_of\_first=1020, freq\_of\_second=780, amp\_of\_first=8192, amp\_of\_second=8192 Jan 7 10:00:24.903: vtsp\_process\_dsp\_message: MSG\_TX\_DTMF\_DIGIT\_OFF: digit=2, duration=30dc\_digit Jan 7 10:00:24.903: csm\_vtsp\_digit\_ready (vtsp\_cdb=0x61B5BFF8) received digit (2) Jan 7 10:00:24.903: CSM voice (1/60): Rcvd Digit detected(2) Jan 7 10:00:24.903: R2 Incoming Voice(1/60): DSX (E1 0:8): **STATE:R2\_IN\_CALLERID R2 Got Event R2\_TONE\_OFF** Jan 7 10:00:24.903: vtsp\_r2\_generate\_digits: vdev\_common=0x6205E5F8, string=5dc\_dial()vtsp\_dial\_nopush dsp\_dtmf\_dialing(): dial\_string = # Jan 7 10:00:24.903: dsp\_dtmf\_dialing: [0:1:8] packet\_Len=24 channel\_id=4929 packet\_id=90 string=# digits=1, time\_on=150, time\_off=30 Jan 7 10:00:24.903: digit=, components=2, freq\_of\_first=0, freq\_of\_second=0, amp\_of\_first=1, amp\_of\_second=1 **!--- Third ANI digit is sent: Forward Signal Group I-3.** Jan 7 10:00:25.003: vtsp\_process\_dsp\_message: **MSG\_TX\_DTMF\_DIGIT\_BEGIN: digit=3**, rtp\_timestamp=0x001E0010 dc\_digit\_up Jan 7 10:00:25.003: csm\_vtsp\_digit\_ready\_up (vtsp\_cdb=0x61B5BFF8) received digit (3) Jan 7 10:00:25.003: CSM voice (1/60): Rcvd Digit detected(3) Jan 7 10:00:25.003: R2 Incoming Voice(1/60): DSX (E1 0:8): **STATE:R2\_IN\_CALLERID R2 Got Event 3 !--- Send Backward Signal Group A-5 (Caller ID request).** Jan 7 10:00:25.003: vtsp\_r2\_generate\_digits: vdev\_common=0x6205E5F8, string=5dc\_dial()vtsp\_dial\_nopush **dsp\_dtmf\_dialing(): dial\_string = 5** Jan 7 10:00:25.003: dsp\_dtmf\_dialing: [0:1:8] packet\_Len=24 channel\_id=4929 packet\_id=90 string=5 digits=1, time\_on=65435, time\_off=30 Jan 7 10:00:25.003: digit=, components=2, freq\_of\_first=1020, freq\_of\_second=780, amp\_of\_first=8192, amp\_of\_second=8192 Jan 7 10:00:25.103: vtsp\_process\_dsp\_message: MSG\_TX\_DTMF\_DIGIT\_OFF:digit=3, duration=30dc\_digit Jan 7 10:00:25.103: csm\_vtsp\_digit\_ready (vtsp\_cdb=0x61B5BFF8) received digit (3) Jan 7 10:00:25.103: CSM voice (1/60): Rcvd Digit detected(3) Jan 7 10:00:25.103: R2 Incoming Voice(1/60): DSX (E1 0:8): **STATE:R2\_IN\_CALLERID R2 Got Event R2\_TONE\_OFF** Jan 7 10:00:25.103: vtsp\_r2\_generate\_digits: vdev\_common=0x6205E5F8, string=5dc\_dial()vtsp\_dial\_nopush dsp\_dtmf\_dialing(): dial\_string = # Jan 7 10:00:25.103: dsp\_dtmf\_dialing: [0:1:8] packet\_Len=24 channel\_id=4929 packet\_id=90 string=# digits=1, time\_on=150, time\_off=30 Jan 7 10:00:25.103: digit=, components=2, freq\_of\_first=0, freq\_of\_second=0, amp\_of\_first=1, amp\_of\_second=1 **!--- Digit 15 is sent: Forward Signal Group I-15 (end of ANI digit).** Jan 7 10:00:25.203: vtsp\_process\_dsp\_message: MSG\_TX\_DTMF\_DIGIT\_BEGIN: digit=15, rtp\_timestamp=0x001E0010 dc\_digit\_up Jan 7 10:00:25.203: csm\_vtsp\_digit\_ready\_up (vtsp\_cdb=0x61B5BFF8) received digit (\*) Jan 7 10:00:25.203: CSM voice (1/60): Rcvd Digit detected(\*) Jan 7 10:00:25.203: R2 Incoming Voice(1/60): DSX (E1 0:8): **STATE:R2\_IN\_CALLERID R2 Got Event 15 !--- Send Backward Signal Group A-1 (next DNIS digit).** Jan 7 10:00:25.203: vtsp\_r2\_generate\_digits: vdev\_common=0x6205E5F8, string=5dc\_dial()vtsp\_dial\_nopush **dsp\_dtmf\_dialing(): dial\_string = 1** Jan 7 10:00:25.203: dsp\_dtmf\_dialing: [0:1:8] packet\_Len=24 channel\_id=4929 packet\_id=90 string=1 digits=1, time\_on=65435, time\_off=30 Jan 7 10:00:25.203: digit=, components=2, freq\_of\_first=1020, freq\_of\_second=1140, amp\_of\_first=8192, amp\_of\_second=8192 Jan 7 10:00:25.303: vtsp\_process\_dsp\_message: **MSG\_TX\_DTMF\_DIGIT\_OFF: digit=15**, duration=30dc\_digit Jan 7 10:00:25.303: csm\_vtsp\_digit\_ready (vtsp\_cdb=0x61B5BFF8) received digit (\*) Jan 7 10:00:25.303: CSM voice (1/60): Rcvd Digit detected(\*) Jan 7 10:00:25.303: R2 Incoming Voice(1/60): DSX (E1 0:8): **STATE:R2\_IN\_COLLECT\_DNIS R2 Got Event R2\_TONE\_OFF** Jan 7 10:00:25.303: vtsp\_r2\_generate\_digits: vdev\_common=0x6205E5F8, string=5dc\_dial()vtsp\_dial\_nopush dsp\_dtmf\_dialing(): dial\_string = # Jan 7 10:00:25.303: dsp\_dtmf\_dialing: [0:1:8] packet\_Len=24 channel\_id=4929 packet\_id=90 string=# digits=1, time\_on=150, time\_off=30 Jan 7 10:00:25.303: digit=, components=2, freq\_of\_first=0, freq\_of\_second=0, amp\_of\_first=1, amp\_of\_second=1 **!--- Second DNIS digit is sent: Forward Signal Group I-6.** Jan 7 10:00:25.391: vtsp\_process\_dsp\_message: **MSG\_TX\_DTMF\_DIGIT\_BEGIN: digit=6**, rtp\_timestamp=0x001E0010 dc\_digit\_up Jan 7 10:00:25.391: csm\_vtsp\_digit\_ready\_up (vtsp\_cdb=0x61B5BFF8) received digit (6) Jan 7 10:00:25.391: CSM voice (1/60): Rcvd Digit detected(6) Jan 7 10:00:25.391: R2 Incoming Voice(1/60): DSX (E1 0:8): **STATE:R2\_IN\_COLLECT\_DNIS R2 Got Event 6 !--- Send Backward Signal Group A-1.** Jan 7 10:00:25.391: vtsp\_r2\_generate\_digits: vdev\_common=0x6205E5F8, string=56dc\_dial() vtsp\_dial\_nopush **dsp\_dtmf\_dialing(): dial\_string = 1** Jan 7 10:00:25.391: dsp\_dtmf\_dialing: [0:1:8] packet\_Len=24 channel\_id=4929 packet\_id=90 string=1 digits=1, time\_on=65435, time\_off=30 Jan 7 10:00:25.391: digit=, components=2, freq\_of\_first=1020, freq\_of\_second=1140, amp\_of\_first=8192, amp\_of\_second=8192 Jan 7 10:00:25.491: vtsp\_process\_dsp\_message: MSG\_TX\_DTMF\_DIGIT\_OFF:digit=6, duration=30dc\_digit Jan 7 10:00:25.491: csm\_vtsp\_digit\_ready (vtsp\_cdb=0x61B5BFF8) received digit (6) Jan 7 10:00:25.491: CSM voice (1/60): Rcvd Digit detected(6) Jan 7 10:00:25.491: R2 Incoming Voice(1/60): DSX (E1 0:8): **STATE: R2\_IN\_COLLECT\_DNIS R2 Got Event R2\_TONE\_OFF** Jan 7 10:00:25.491: vtsp\_r2\_generate\_digits: vdev\_common=0x6205E5F8, string=56dc\_dial() vtsp\_dial\_nopush dsp\_dtmf\_dialing(): dial\_string = # Jan 7 10:00:25.491: dsp\_dtmf\_dialing: [0:1:8] packet\_Len=24 channel\_id=4929 packet\_id=90 string=# digits=1, time\_on=150, time\_off=30 Jan 7 10:00:25.491: digit=, components=2, freq\_of\_first=0, freq\_of\_second=0, amp\_of\_first=1, amp\_of\_second=1 **!--- Third DNIS digit is sent: Forward Signal Group I-7.** Jan 7 10:00:25.583: vtsp\_process\_dsp\_message:

MSG\_TX\_DTMF\_DIGIT\_BEGIN: digit=7, rtp\_timestamp=0x001E0010 dc\_digit\_up Jan 7 10:00:25.583:  
csm\_vtsp\_digit\_ready\_up (vtsp\_cdb=0x61B5BFF8) received digit (7) Jan 7 10:00:25.583: CSM voice  
(1/60): Rcvd Digit detected(7) Jan 7 10:00:25.583: R2 Incoming Voice(1/60): DSX (E1 0:8):  
**STATE:R2\_IN\_COLLECT\_DNIS R2 Got Event 7 !--- Send Backward Signal Group A-1.** Jan 7 10:00:25.583:  
vtsp\_r2\_generate\_digits: vdev\_common=0x6205E5F8, string=567dc\_dial()vtsp\_dial\_nopush  
**dsp\_dtmf\_dialing(): dial\_string = 1** Jan 7 10:00:25.583: dsp\_dtmf\_dialing: [0:1:8] packet\_Len=24  
channel\_id=4929 packet\_id=90 string=1 digits=1, time\_on=65435, time\_off=30 Jan 7 10:00:25.583:  
digit=, components=2, freq\_of\_first=1020, freq\_of\_second=1140, amp\_of\_first=8192,  
amp\_of\_second=8192 Jan 7 10:00:25.683: vtsp\_process\_dsp\_message: MSG\_TX\_DTMF\_DIGIT\_OFF: digit=7,  
duration=30dc\_digit Jan 7 10:00:25.683: csm\_vtsp\_digit\_ready (vtsp\_cdb=0x61B5BFF8) received  
digit (7) Jan 7 10:00:25.683: CSM voice (1/60): Rcvd Digit detected(7) Jan 7 10:00:25.683: R2  
Incoming Voice(1/60): DSX (E1 0:8): **STATE:R2\_IN\_COLLECT\_DNIS R2 Got Event R2\_TONE\_OFF** Jan 7  
10:00:25.683: vtsp\_r2\_generate\_digits: vdev\_common=0x6205E5F8,  
string=567dc\_dial()vtsp\_dial\_nopush dsp\_dtmf\_dialing(): dial\_string = # Jan 7 10:00:25.683:  
dsp\_dtmf\_dialing: [0:1:8] packet\_Len=24 channel\_id=4929 packet\_id=90 string=# digits=1,  
time\_on=150, time\_off=30 Jan 7 10:00:25.683: digit=, components=2, freq\_of\_first=0,  
freq\_of\_second=0, amp\_of\_first=1, amp\_of\_second=1 Jan 7 10:00:25.835: vtsp\_process\_dsp\_message:  
MSG\_TX\_DIALING\_DONEdc\_dialing\_done() **!--- Timeout is 3 seconds.** Jan 7 10:00:28.583: R2 Incoming  
Voice(1/60): DSX (E1 0:8): **STATE:R2\_IN\_COLLECT\_DNIS R2 Got Event R2\_TONE\_TIMER !--- Send  
Backward Signal Group A-3: address-complete, changeover !--- to reception of group-B signal.** Jan  
7 10:00:28.583: vtsp\_r2\_generate\_digits: vdev\_common=0x6205E5F8,  
string=567dc\_dial()vtsp\_dial\_nopush dsp\_dtmf\_dialing(): dial\_string = 3# Jan 7 10:00:28.583:  
**dsp\_dtmf\_dialing: [0:1:8] packet\_Len=36 channel\_id=4929 packet\_id=90** string=3# digits=2,  
time\_on=150, time\_off=30 Jan 7 10:00:28.583: digit=, components=2, freq\_of\_first=1020,  
freq\_of\_second=900, amp\_of\_first=8192, amp\_of\_second=8192 Jan 7 10:00:28.583: digit=,  
components=2, freq\_of\_first=0, freq\_of\_second=0, amp\_of\_first=1, amp\_of\_second=1 **!--- Forward  
Signal Group II-1 is sent: subscriber without priority.** Jan 7 10:00:28.831:  
vtsp\_process\_dsp\_message: MSG\_TX\_DTMF\_DIGIT\_BEGIN: digit=1, rtp\_timestamp=0x001E0003 dc\_digit\_up  
Jan 7 10:00:28.831: csm\_vtsp\_digit\_ready\_up (vtsp\_cdb=0x61B5BFF8) received digit (1) Jan 7  
10:00:28.831: CSM voice (1/60): Rcvd Digit detected(1) Jan 7 10:00:28.831: R2 Incoming  
Voice(1/60): DSX (E1 0:8): **STATE:R2\_IN\_CATEGORY R2 Got Event 1** Jan 7 10:00:28.831:  
CSM\_PROC\_IC1\_COLLECT\_ADDR\_INFO: CSM\_EVENT\_ADDR\_INFO\_COLLECTED (DNIS=567, ANI=123) at slot 1,  
port 60 Jan 7 10:00:28.831: vtsp\_tsp\_call\_accept\_check (sdb=0x61DADEE0, calling\_number=123  
called\_number=567): peer\_tag=0 Jan 7 10:00:28.835: VDEV\_ALLOCATE: failed to allocate a device  
Jan 7 10:00:28.835: VDEV\_ALLOCATE\_ALMOST\_READY: failed to allocate a non-idle modem Jan 7  
10:00:28.835: VDEV\_ALLOCATE: failed to allocate a device Jan 7 10:00:28.835:  
VDEV\_ALLOCATE\_ALMOST\_READY: failed to allocate a non-idle modem Jan 7 10:00:28.835:  
VDEV\_ALLOCATE: failed to allocate a device Jan 7 10:00:28.835: VDEV\_ALLOCATE\_ALMOST\_READY:  
failed to allocate a non-idle modem Jan 7 10:00:28.835: CSM\_PROC\_IC3\_WAIT\_FOR\_RES\_RESP:  
CSM\_EVENT\_RESOURCE\_OK at slot 1, port 60 Jan 7 10:00:28.835: vtsp\_IC\_switch : (voice\_vdev=  
0x61F19688) Jan 7 10:00:28.835: vtsp\_tsp\_call\_switch\_ind (cdb=0x61B5BFF8, tsp\_info=0x61F19688,  
calling\_number=123 called\_number=567 redirect\_number=): peer\_tag=123dc\_switch: fsm\_pop() Jan 7  
10:00:28.835: vtsp\_do\_call\_setup\_ind Jan 7 10:00:28.835: vtsp\_do\_call\_setup\_ind: Call ID=65581,  
guid=62031A88 Jan 7 10:00:28.835: vtsp\_do\_call\_setup\_ind: type=0, under\_spec=0, name=b`, id0=9,  
id1=0, id2=0, calling=123, called=567 Jan 7 10:00:28.835: dsp\_cp\_tone\_off: [] packet\_Len=8  
channel\_id=4929 packet\_id=71 Jan 7 10:00:28.835: dsp\_idle\_mode: [] packet\_Len=8 channel\_id=4929  
packet\_id=68 Jan 7 10:00:28.835: dsp\_close\_voice\_channel: [] packet\_Len=8 channel\_id=4929  
packet\_id=75 Jan 7 10:00:28.835: vtsp\_timer\_stop: 7063006 Jan 7 10:00:28.839:  
csm\_vtsp\_call\_setup\_resp (vdev\_info=0x61F19688, vtsp\_cdb=0x61B5BFF8) Jan 7 10:00:28.839:  
csm\_vtsp\_call\_setup\_resp:vdev\_common BP TS allocatedat BP\_stream0, BP\_Ch8 Jan 7 10:00:28.839:  
csm\_vtsp\_call\_setup\_resp:DST\_tdm\_chnl call. BP TS allocatedat stream 5, chan 13,BP\_stream 0,  
BP\_ch 8 Jan 7 10:00:28.839: csm\_vtsp\_call\_setup\_resp:DST\_tdm\_chnl call. BP TS allocatedat stream  
5, chan 13,BP\_stream 0, BP\_ch 8vtsp\_open\_voice\_and\_set\_params Jan 7 10:00:28.839:  
dsp\_close\_voice\_channel: [0:1 (17)] packet\_Len=8 channel\_id=4929 packet\_id=75 Jan 7  
10:00:28.839: dsp\_open\_voice\_channel\_20: [0:1 (17)] packet\_Len=16 channel\_id=4929 packet\_id=74  
alaw\_ulaw\_select=1 associated\_signaling\_channel=0 time\_slot=0 serial\_port=0 Jan 7 10:00:28.839:  
dsp\_encap\_config\_20: [0:1 (17)] packet\_Len=24 channel\_id=4929 packet\_id=92 TransportProtocol 2  
t\_ssrc=0x0 r\_ssrc=0x0t\_vpxcc=0x0 r\_vpxcc=0x0 Jan 7 10:00:28.839: dsp\_set\_playout: [0:1 (17)]  
packet\_Len=18 channel\_id=4929 packet\_id=76 mode=1 initial=60 min=4 max=200 fax\_nom=300 Jan 7  
10:00:28.839: dsp\_echo\_canceller\_control: [0:1 (17)] packet\_Len=10 channel\_id=4929 packet\_id=66  
flags=0x0 Jan 7 10:00:28.839: dsp\_set\_gains: [0:1 (17)] packet\_Len=12 channel\_id=4929  
packet\_id=91 in\_gain=0 out\_gain=0 Jan 7 10:00:28.839: dsp\_vad\_enable: [0:1 (17)] packet\_Len=10  
channel\_id=4929 packet\_id=78 thresh=-38act\_proceeding Jan 7 10:00:28.839:  
csm\_vtsp\_call\_proceeding:DST\_tdm\_chnl call. BP TS allocatedatstream 5, chan 13,BP\_stream 0, BP\_ch

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8act_alert Jan 7 10:00:28.867: vtsp_ring_noan_timer_start: 7063009 Jan 7 10:00:28.867:
csm_vtsp_call_alert (vtsp_cdb=0x61B5BFF8) Jan 7 10:00:28.867: csm_vtsp_call_alert:
CSM_EVENT_ALERTING_RECEIVED Jan 7 10:00:28.867: CSM_IC5_WAIT_FOR_SWITCH_OVER: at slot 1, port 60
Jan 7 10:00:28.867: CSM_EVENT_ALERTING_RECEIVED: Jan 7 10:00:28.867: calling
alerting_start_event !--- Note: For modems, Backward Signal !--- Group B-6 (subscriber's line
free, charge) !--- is sent immediately. !--- For voice, it is delayed until alerting is
received. !--- Notice that "R2_REJECT" is printed instead of R2_ALERTING. !--- This printing
issue is solved in Cisco IOS Software Release 12.1T. Jan 7 10:00:28.867: R2 Incoming
Voice(1/60): DSX (E1 0:8): STATE:R2_IN_IDLE R2 Got Event R2_REJECT Jan 7 10:00:28.867:
R2_ALERTING: r2_comp_idle Jan 7 10:00:28.867: vtsp_r2_generate_digits: vdev_common=0x6205E5F8,
string=567act_bridge Jan 7 10:00:28.867: dsp_voice_mode: [0:1 (17)] packet_Len=24
channel_id=4929 packet_id=73 coding_type=1 voice_field_size=80 VAD_flag=0 echo_length=64
comfort_noise=1 inband_detect=1 digit_relay=2 AGC_flag=0dsp_dtmf_mode
(VTSP_TONE_R2_MF_FORWARD_MODE) !--- Answer signal (B-6) is sent after alerting is received. !---
Send Backward Signal Group B6 signal (Subscriber's line free, charge). Jan 7 10:00:28.871:
dsp_dtmf_mode: [0:1 (17)] packet_Len=10 channel_id=4929 packet_id=65 dtmf_or_mf=1vtsp_r2_dial
vtsp_r2_dial(): fsm_push(vtsp_r2_state_table) dsp_dtmf_dialing(): dial_string = 6 Jan 7
10:00:28.871: dsp_dtmf_dialing: [0:1 (17)] packet_Len=24 channel_id=4929 packet_id=90 string=6
digits=1, time_on=65435, time_off=30 Jan 7 10:00:28.871: digit=, components=2,
freq_of_first=900, freq_of_second=780, amp_of_first=8192, amp_of_second=8192 Jan 7 10:00:28.923:
vtsp_process_dsp_message: MSG_TX_DTMF_DIGIT_BEGIN: digit=1, rtp_timestamp=0x001E0006 dc_digit_up
Jan 7 10:00:28.923: csm_vtsp_digit_ready_up (vtsp_cdb=0x61B5BFF8) received digit (1) Jan 7
10:00:28.923: CSM voice (1/60): Rcvd Digit detected(1) Jan 7 10:00:28.923: R2 Incoming
Voice(1/60): DSX (E1 0:8): STATE: R2_IN_COMPLETE R2 Got Event 1 Jan 7 10:00:28.971:
vtsp_process_dsp_message: MSG_TX_DTMF_DIGIT_OFF: digit=1, duration=30dc_digit Jan 7
10:00:28.971: csm_vtsp_digit_ready (vtsp_cdb=0x61B5BFF8) received digit (1) Jan 7 10:00:28.971:
CSM voice (1/60): Rcvd Digit detected(1) Jan 7 10:00:28.971: R2 Incoming Voice(1/60): DSX (E1
0:8): STATE: R2_IN_COMPLETE R2 Got Event R2_TONE_OFF Jan 7 10:00:28.971:
vtsp_r2_generate_digits: vdev_common=0x6205E5F8, string=567dc_dial() vtsp_dial_nopush
dsp_dtmf_dialing(): dial_string = # Jan 7 10:00:28.971: dsp_dtmf_dialing: [0:1 (17)]
packet_Len=24 channel_id=4929 packet_id=90 string=# digits=1, time_on=150, time_off=30 Jan 7
10:00:28.975: digit=, components=2, freq_of_first=0, freq_of_second=0, amp_of_first=1,
amp_of_second=1ds_dialing_defaultsds_dialing_default Jan 7 10:00:29.127:
vtsp_process_dsp_message: MSG_TX_DIALING_DONEdc_dialing_done() Jan 7 10:00:29.971: R2 Incoming
Voice(1/60): DSX (E1 0:8): STATE: R2_IN_WAIT_GUARD R2 Got Event R2_TONE_TIMER Jan 7
10:00:29.971: R2_IN_IDLE:2 r2_in_connect called Jan 7 10:00:29.971: R2_IN_CONNECT: call end dial
Jan 7 10:00:29.971: pop the dial state machine Jan 7 10:00:29.971: vtsp_r2_end_dial:
vdev_common=0x6205E5F8, string=567ds_end_dial(): fsm_pop() act_caps_ind Jan 7 10:00:29.971:
act_caps_ind:Encap 1, Vad 2, Codec 0x4, CodecBytes 20, FaxRate 2, FaxBytes 20 SignalType 0
DtmfRelay 1, Modem lact_caps_ack Jan 7 10:00:29.971: dsp_idle_mode: [0:1 (17)] packet_Len=8
channel_id=4929 packet_id=68 Jan 7 10:00:29.971: act_caps_ack: codec = 15, ret = 1 Jan 7
10:00:29.971: dsp_cp_tone_off: [0:1 (17)] packet_Len=8 channel_id=4929 packet_id=71 Jan 7
10:00:29.971: dsp_idle_mode: [0:1 (17)] packet_Len=8 channel_id=4929 packet_id=68 Jan 7
10:00:29.971: dsp_encap_config_20: [0:1 (17)] packet_Len=24 channel_id=4929 packet_id=92
TransportProtocol 2 t_ssrc=0x0 r_ssrc=0x0 t_vpxcc=0x0 r_vpxcc=0x0 Jan 7 10:00:29.971:
dsp_voice_mode: [0:1 (17)] packet_Len=24 channel_id=4929 packet_id=73 coding_type=19
voice_field_size=20 VAD_flag=1 echo_length=64 comfort_noise=1 inband_detect=1 digit_relay=2
AGC_flag=0act_alert_connect Jan 7 10:00:30.255: vtsp_ring_noan_timer_stop: 7063148 Jan 7
10:00:30.255: dsp_cp_tone_off: [0:1 (17)] packet_Len=8 channel_id=4929 packet_id=71 Jan 7
10:00:30.255: csm_vtsp_call_connect (vtsp_cdb=0x61B5BFF8, voice_vdev=0x61F19688) Jan 7
10:00:30.255: CSM_IC5_WAIT_FOR_SWITCH_OVER: CSM_EVENT_MODEM_OFFHOOK at slot 1, port 60 Jan 7
10:00:30.607: CSM_RX_CAS_EVENT_FROM_NEAT:(0007): EVENT_CHANNEL_CONNECTED at slot 1 and port 60
Jan 7 10:00:30.607: CSM_PROC_IC6_WAIT_FOR_CONNECT: CSM_EVENT_DSX0_CONNECTED at slot 1, port 60
Jan 7 10:00:30.607: from NEAT(0): (0/8): TX ANSWERED (ABCD=0101) eefje#

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## Дополнительные сведения

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- [Сигнализация E1 R2 для маршрутизаторов Cisco серии 3620 и 3640](#)
- [Пользовательская настройка сигнализации R2 для каналов E1 с помощью команды "cas-custom"](#)



- [Сигнализация E1 R2 и настройка сигнализации по выделенному каналу](#)
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