



TECHNICAL MANUAL

VDS SYSTEM

Section II

Installation Diagrams



VDS TECHNICAL MANUAL

The VDS technical manual is comprised of two sections:

- Section I: Description of the VDS System (Code 97508I-1)
- Section II: VDS Installation Diagrams (Code 97508I-2)

VDS Technical Manual - Section I I
Code 97508I-2 V07_09

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VDS DIAGRAM SYSTEM PLANNER

The VDS technical manual includes a *system planner* which facilitates diagram management and installation diagram design (depending on the type of VDS system).

The **system planner**, along with the **diagram index**, can be used to create a «block diagram» of the system, which can be sent to the installer to ensure that he can easily locate the «VDS diagrams» required for installation.

The diagram numbers comprising each system block (taken from the index) are noted on the planner.

System Planner Example

VDS System: System with 2 video accesses and central guard unit for 24 properties, distributed between 2 backbones for 12 properties each. 1 monitor per property (possibility of adding more terminals within the property).

- 1.- Select the corresponding *planner* (see image 1).
- 2.- Go to diagram index (see image 2).

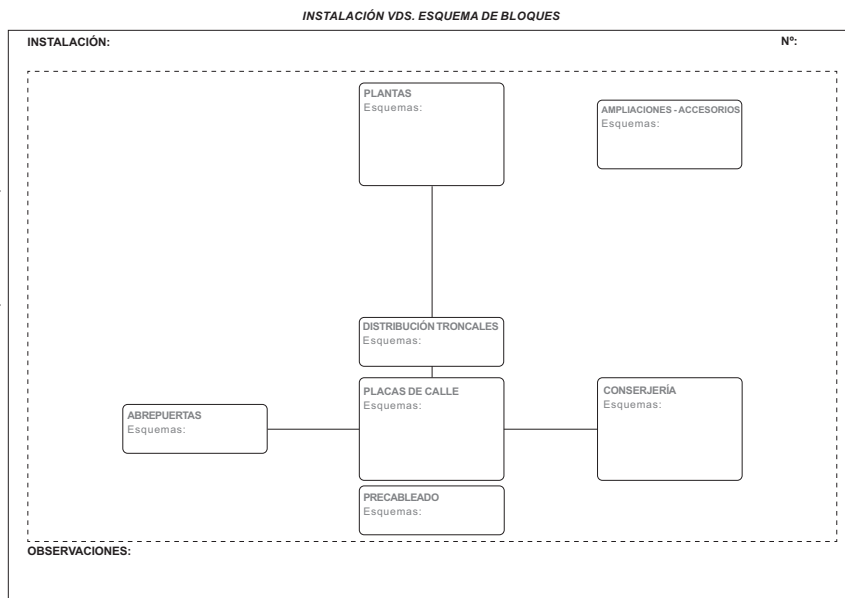


Image 1: Planner

VDS		FERMAX
INDICE GENERAL. Esquemas de instalaciones VDS.		Nº Pág
* Cableado interno de placas. Precableado	1	1
- Placas VDS «Amplificador nueva CityLine»	1	1
- Placa de Pulsadores (audio/vídeo). De 1 a 3 pulsadores	3	3
- Placa de Pulsadores (audio/vídeo). Más de 3 pulsadores	4	4
- Placa Modular (audio/vídeo)	5	4
- Placa Direct (audio/vídeo)	5	4
- Placa Digital (audio/vídeo)	5	4
* Conexión abrepuertas	5	5
- Conexión abrepuertas de corriente alterna	21	5
- Conexión abrepuertas de corriente continua	22	5
* Placas de calle	6	6
- Placas de Audio (City, Direct y Digital)	31	6
- 1 acceso de Audio	32	7
- 2 accesos de Audio	32	7
- Placas de Vídeo (City, Direct y Digital)	33	6
- 1 acceso de Vídeo	34	6
- 2 accesos de Vídeo	34	6
- Placas de Audio-Vídeo (City, Direct y Digital)	35	12
- 1 acceso de Audio + 1 acceso de Vídeo	35	12
* Central de conserjería	14	14
- Esquema general	41	14
- Módulo de conserjería	42	14
- Intercamunicación	43	17
* Distribución en varios ramales (verticales)	18	18
- Distribución en 2 troncales	51	18
- Distribución en 4 troncales	54	18
* Distribución en Planta	20	20
- Plantas de audio (teléfonos)	61	20
- Plantas de audio con alimentación adicional	62	21
- Plantas de vídeo. En cascada	63	22
- Plantas de vídeo con alimentación adicional. En cascada	64	24
- Plantas de vídeo. Sin distribución	65	26
- Plantas de vídeo con alimentación adicional. En distribución	66	28
- Plantas mixtas de audio + vídeo	67	30
* Ampliaciones y accesorios	32	32
- Monitor y teclado adicional	81	32
- Cámara aérea	82	34
- Iluminación adicional en placa	83	35
- Activador de luces y símbolos	84	35
- Protector de faros	85	37
- Pulsador adicional timbre puerta de vivienda	86	37
- Pulsador de zigzag para apertura de puerta desde el interior	87	37
- Apertura de 2ª puerta desde pulsador adicional del monitor/teléfono	88	38
- Apertura simultánea de 2 puertas con abrepuertas de continua y de alterna	89	39
- Abrepuertas compartido por dos placas	90	39
- Visualización de la imagen de videoportero en la TV (a través de euroconector)	91	40

Image 2: Index
Highlighted diagrams to be used in the system.

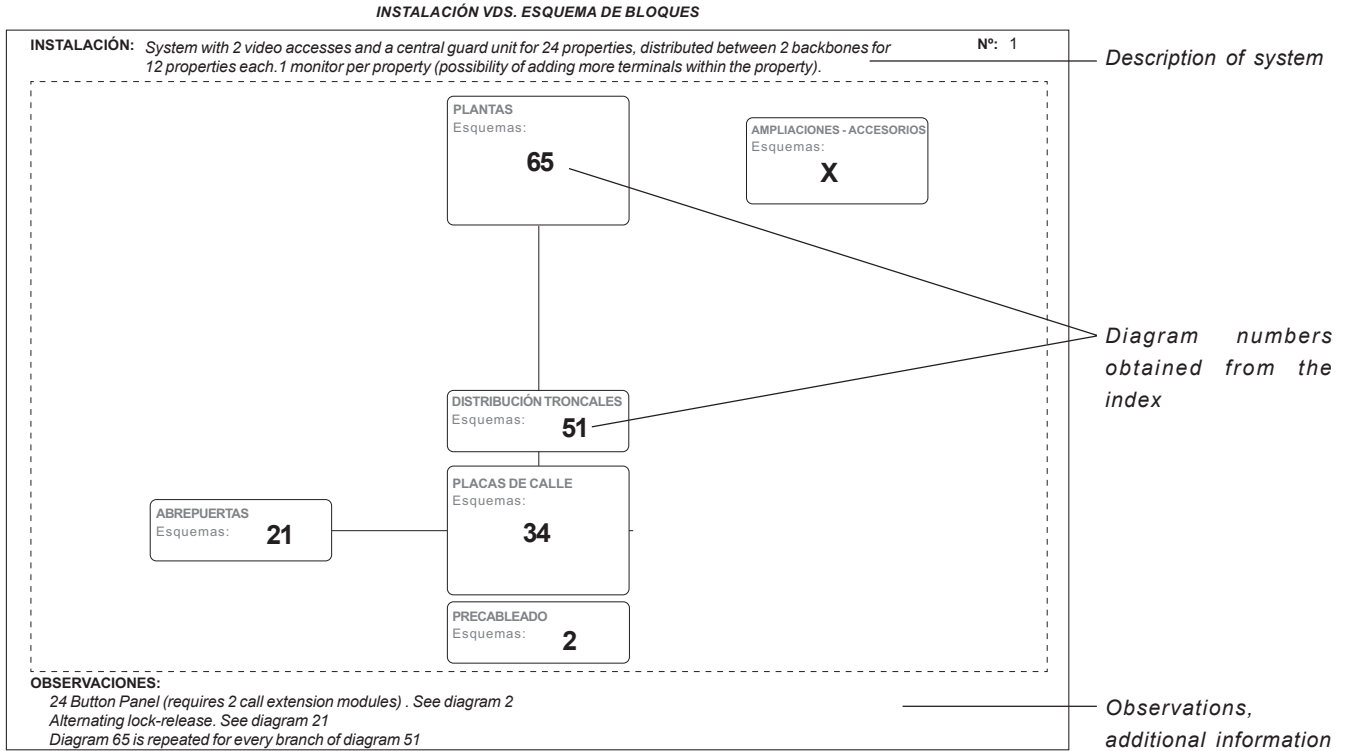
3.- Select the corresponding installation diagrams from each of the index sections and note the diagram numbers (associated to each part/block) in each of the *planner's* boxes.

4.- After completing the *System Planner*, you have a comprehensive guide to the diagrams included in the system, therefore it will only be necessary to select the complete diagrams from the diagram set.

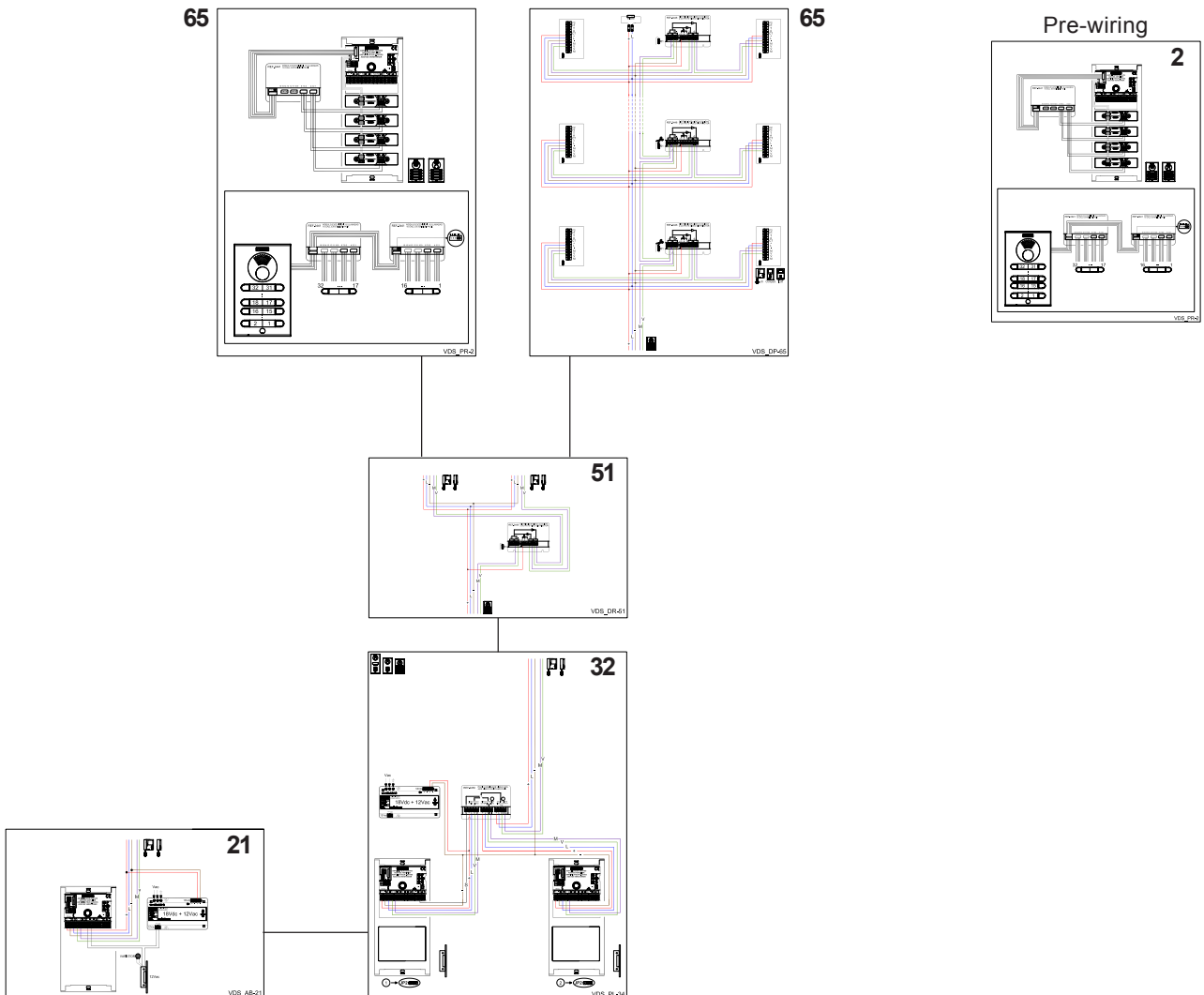
It may not be necessary to fill in all the Planner boxes if some of the available elements are not required. In this case, it is recommended that you put an X in the boxes which will not be used, to avoid confusion.

See the result on the next page!!

Installation Planner with the corresponding system diagram numbers:

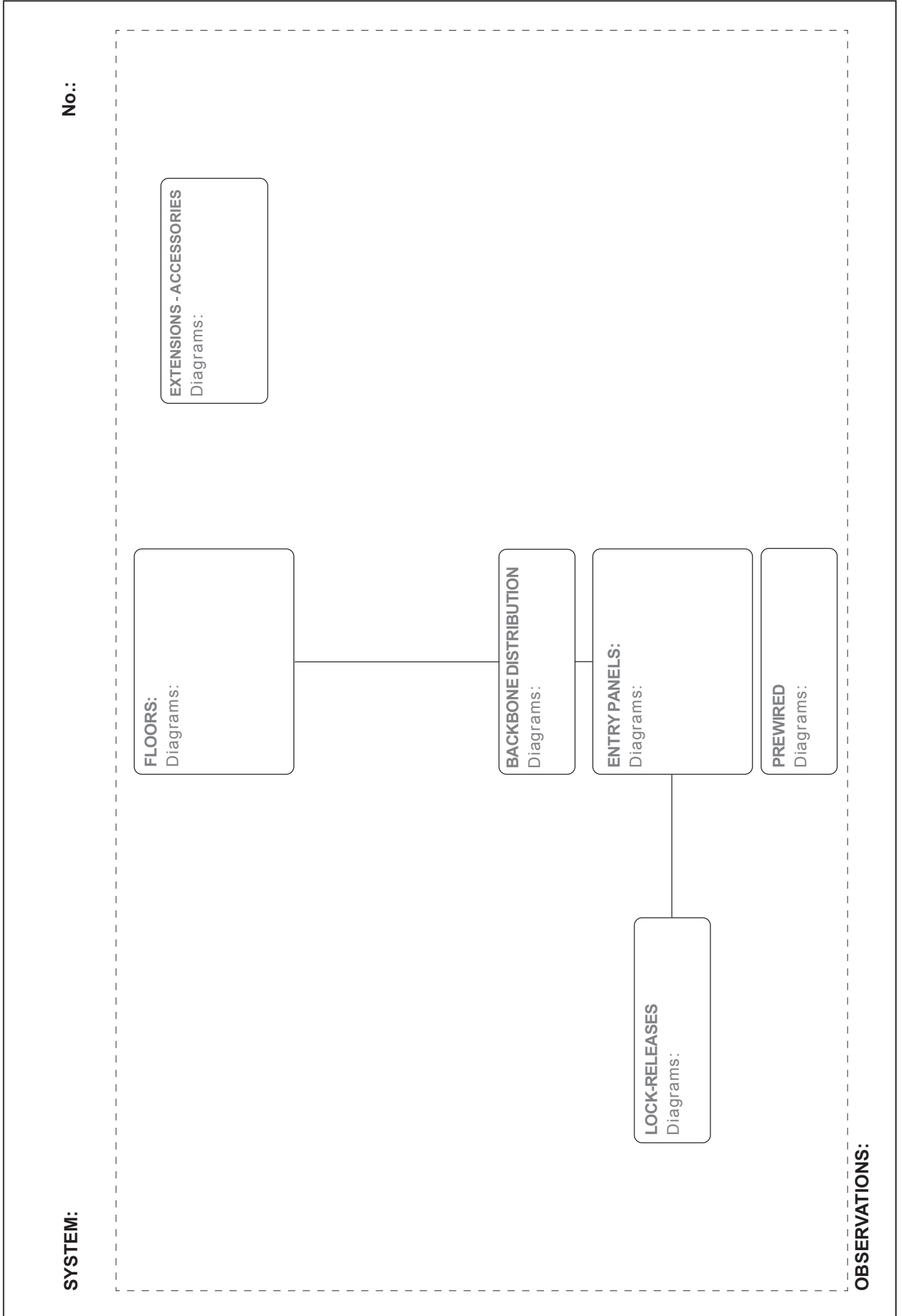


The diagrams indicated on the planner are obtained from the range of diagrams:



VDS SYSTEM: BLOCK DIAGRAM

VDS SYSTEM: BLOCK DIAGRAM



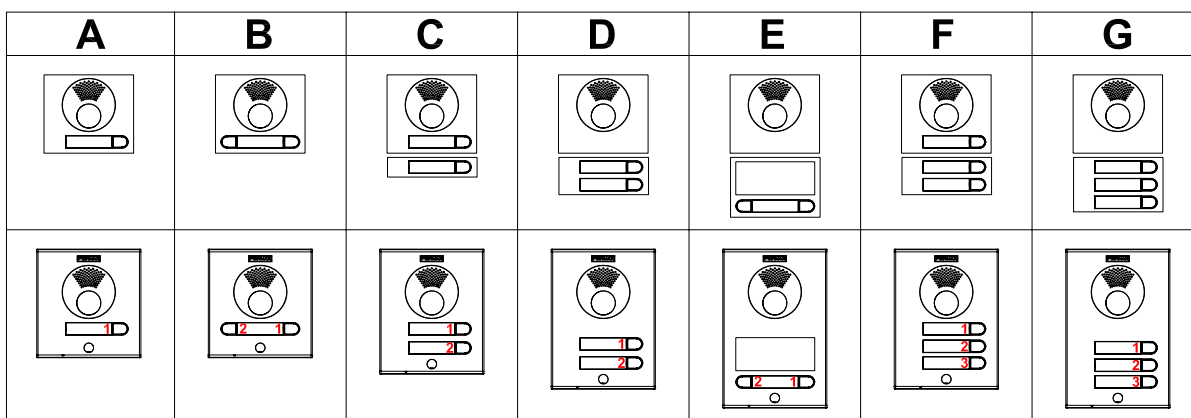
***DIAGRAMS
VDS SYSTEM***

GENERAL INDEX. VDS Installation Diagrams

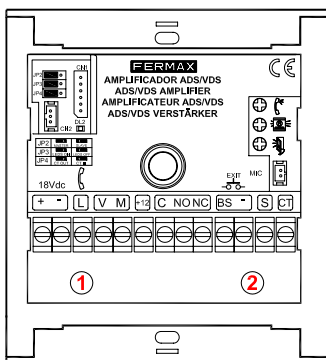
	No	Page
* Internal panel wiring. Pre-wiring		1
- VDS Panels «New Cityline Amplifier»		
· Button panel (audio/video). With 1 to 3 buttons	1	1
· Button panel (audio/video). More than 3 buttons	2	2
· Modular panel (audio/video)	3	3
· Direct panel (audio/video)	4	4
· Digital panel (audio/video)	5	4
* Lock-release connection		5
· Lock-release connection with alternating current	21	5
· Lock-release connection with continuous current	22	5
* Entry Panels		6
- Audio Panels (City, Direct and Digital)		
· 1 Audio Access Point	31	6
· 2 Audio Access Points	32	7
- Video Panels (City, Direct and Digital)		
· 1 Video Access Point	33	8
· 2 Video Access Points	34	10
- Audio + Video Panels (City, Direct and Digital)		
· 1 Audio Access Point + 1 Video Access Point	35	12
* Central Guard Unit		14
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· Cascade power video floors with additional power supply	64	24
· Distributed power video floors	65	26
· Distributed power video floors with additional power supply	66	28
· Mixed Audio + Video Floors	67	30
* Extensions and accessories		32
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· Aerial Camera	82	34
· Additional Panel Lighting	83	36
· Light and Doorbell Activator	84	36
· Call Extender	85	37
· Additional residential doorbell button	86	37
· Hall Button to open the door from inside	87	37
· 2nd door opening function using the monitor/telephone's additional button	88	38
· Simultaneous 2 door opening function with continuous and alternating lock-releases.	89	39
· Lock-Release functions distributed over two panels.	90	39
· View of video door entry system images on the TV (via the euroconnector).	91	40

Nº: diagram number.

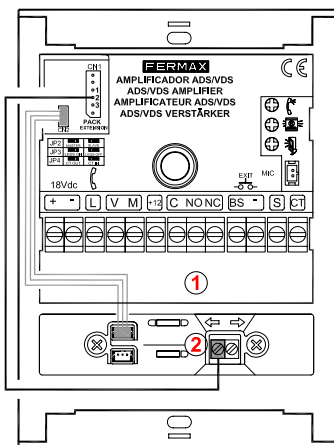
- E** Precableado. Placa de pulsadores VDS (audio/video). De 1 a 3 pulsadores.
- EN** Prewired. VDS button panel (audio/video). Between 1 and 3 Buttons.
- F** Précâblage. Platine VDS à boutons-poussoirs (audio/vidéo). De 1 à 3 boutons-poussoirs.
- D** Vorverkabelung. Audio-/Videotürstation VDS mit Tasten. Mit 1 bis 3 Tasten.



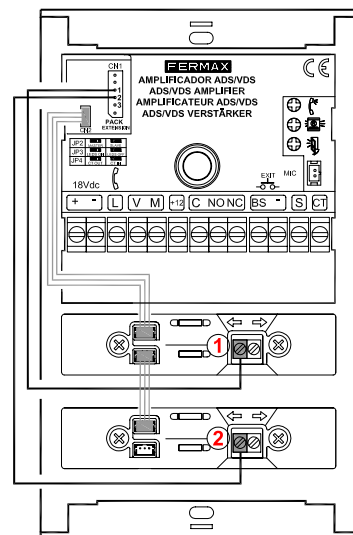
A / B



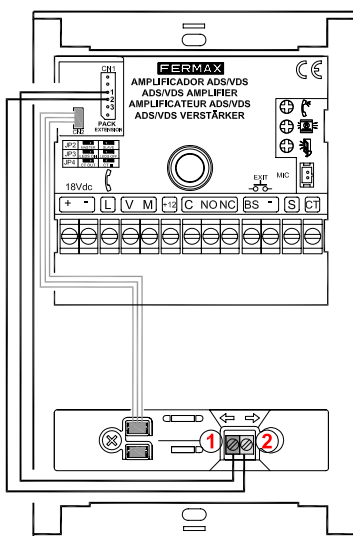
C



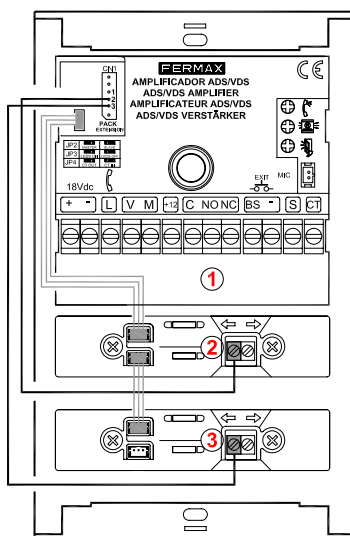
D



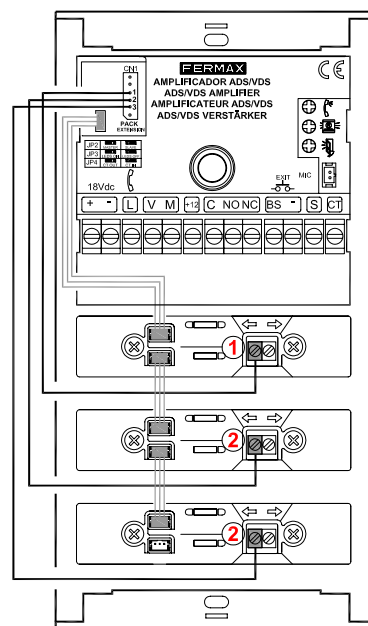
E



F

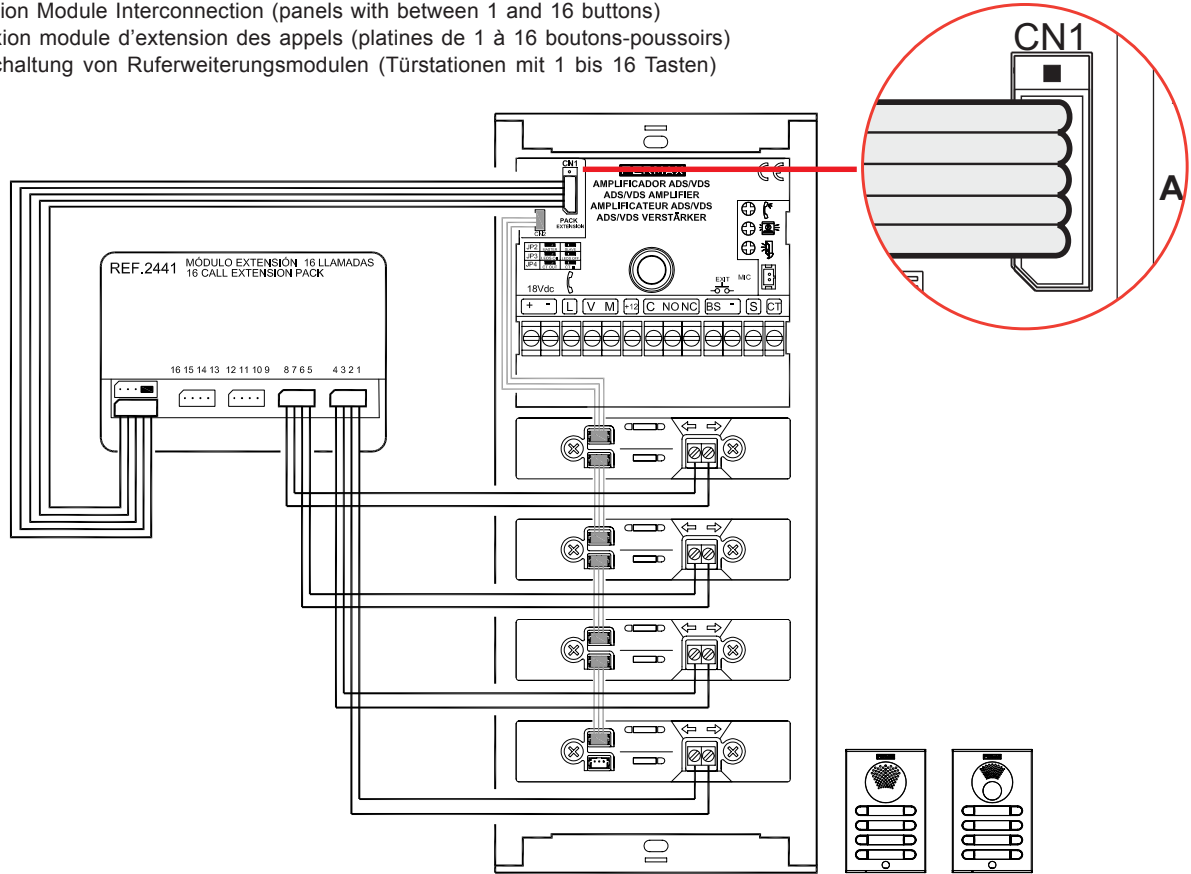


G

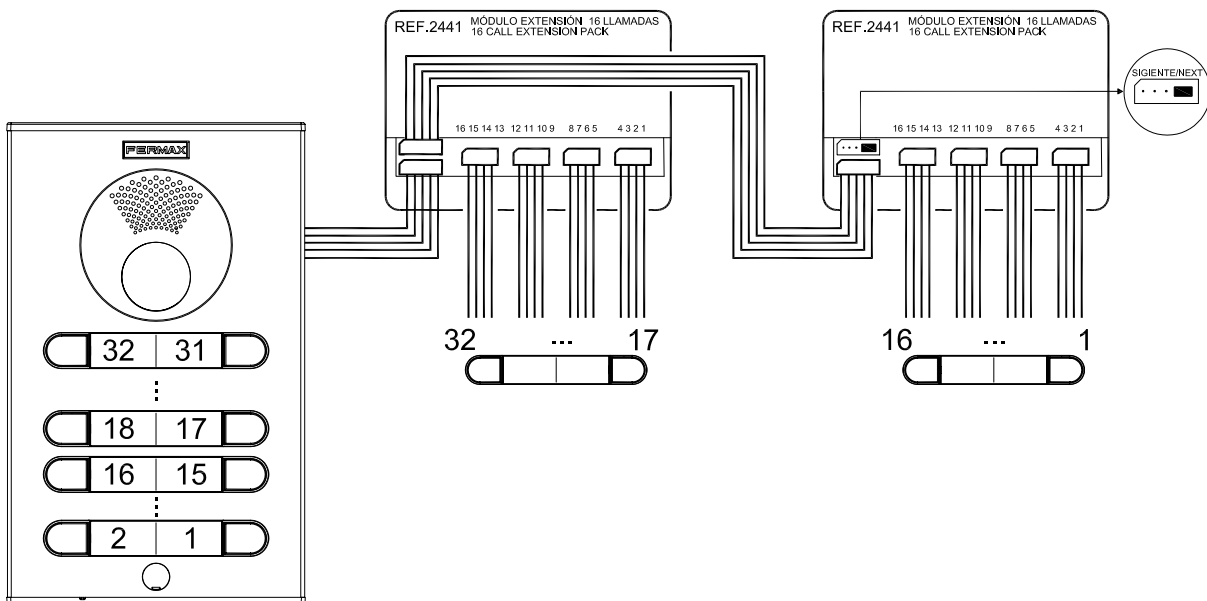


- E** Precableado. Placa de pulsadores VDS (audio/video). Más de 3 Pulsadores.
- EN** Prewired. VDS button panel (audio/video). More than 3 Buttons.
- F** Précâblage. Platine VDS à boutons-poussoirs (audio/vidéo). Plus de 3 boutons-poussoirs.
- D** Vorverkabelung. Audio-/Videotürstation VDS mit Tasten. Mehr als 3 Tasten.

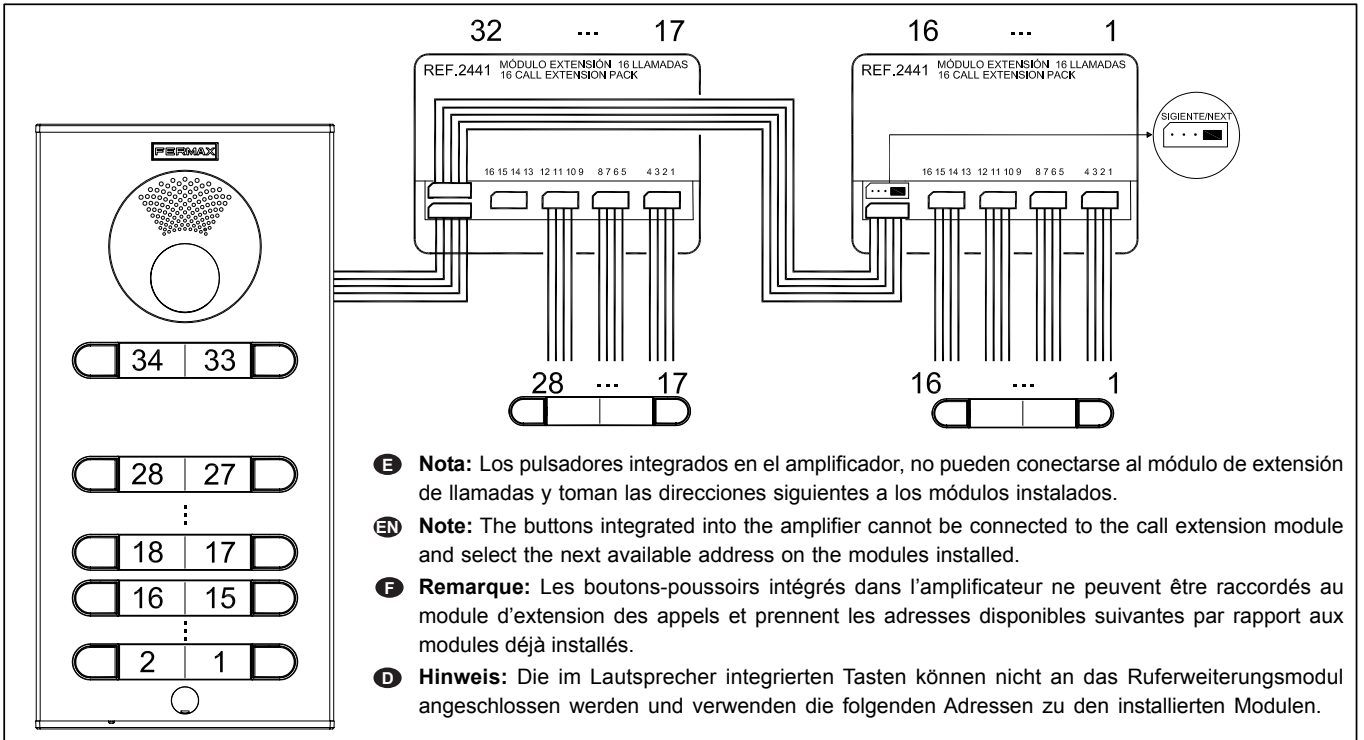
- E** Interconexión módulo de extensión de llamadas (placas de 1 a 16 pulsadores)
- EN** Call Extension Module Interconnection (panels with between 1 and 16 buttons)
- F** Interconnexion module d'extension des appels (platines de 1 à 16 boutons-poussoirs)
- D** Zwischenschaltung von Rufweiterungsmodulen (Türstationen mit 1 bis 16 Tasten)



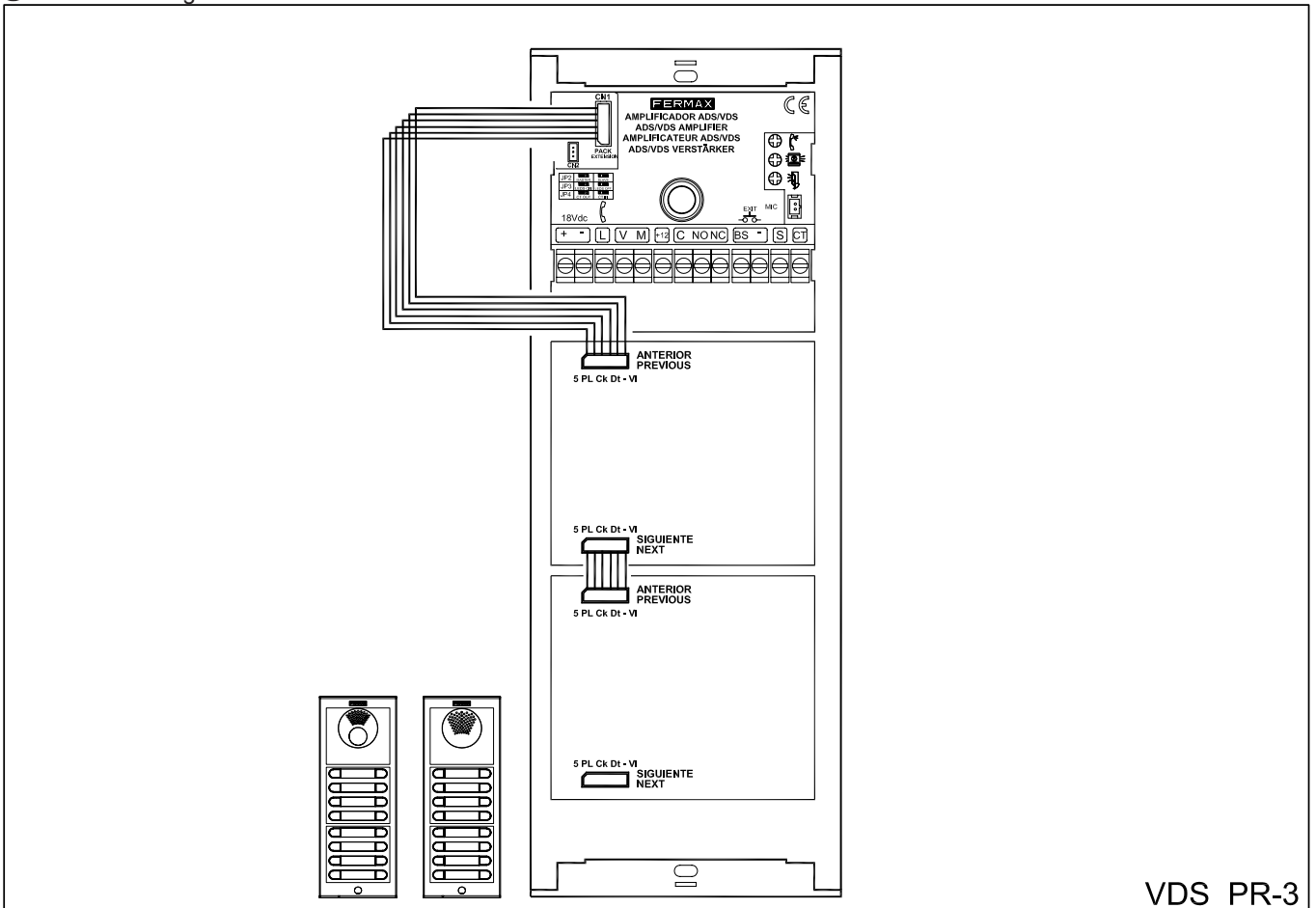
- E** a) Interconexión módulos de extensión de llamadas (placas con más de 16 pulsadores)
- EN** a) Call Extension Module Interconnection (panels with more than 16 buttons)
- F** a) Interconnexion modules d'extension des appels (platines avec plus de 16 boutons-poussoirs)
- D** a) Zwischenschaltung von Rufweiterungsmodulen (Türstationen mit mehr als 16 Tasten)



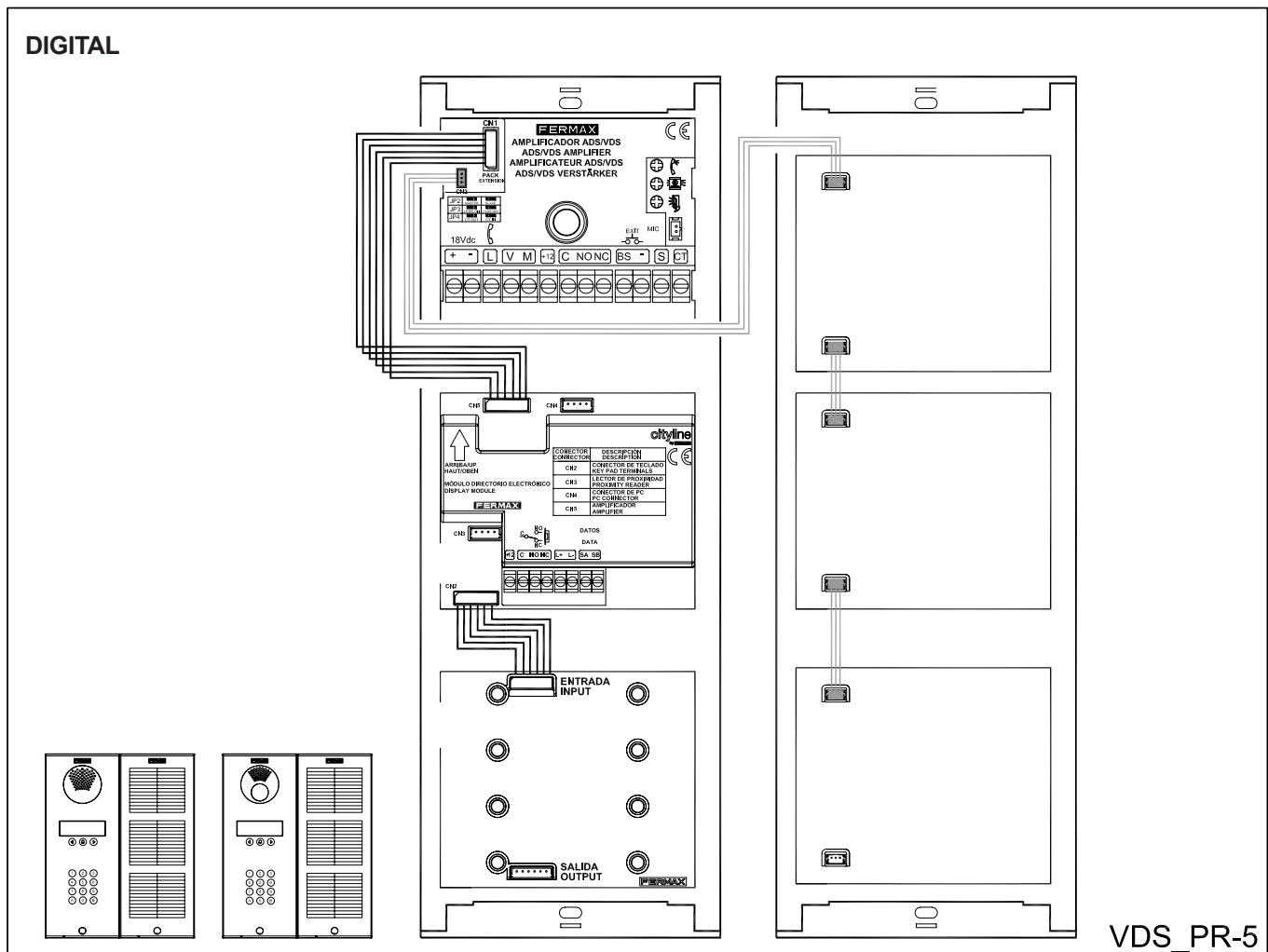
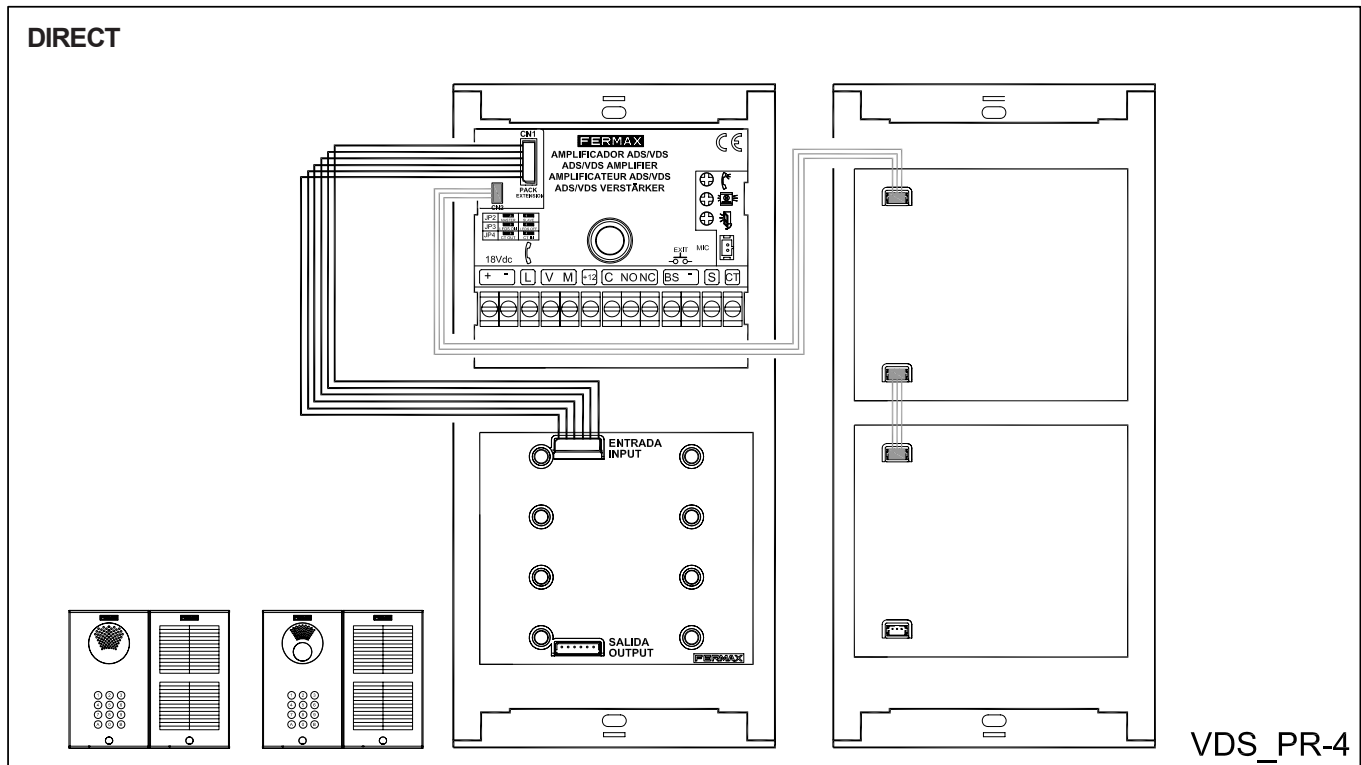
- Ⓔ b) Interconexión módulos de extensión de llamadas (placas con más de 16 pulsadores)
- Ⓔ b) Call Extension Module Interconnection (panels with more than 16 buttons)
- Ⓕ b) Interconnexion modules d'extension des appels (platinés avec plus de 16 boutons-poussoirs)
- Ⓖ b) Zwischenschaltung von Rufweiterungsmodulen (Türstationen mit mehr als 16 Tasten)



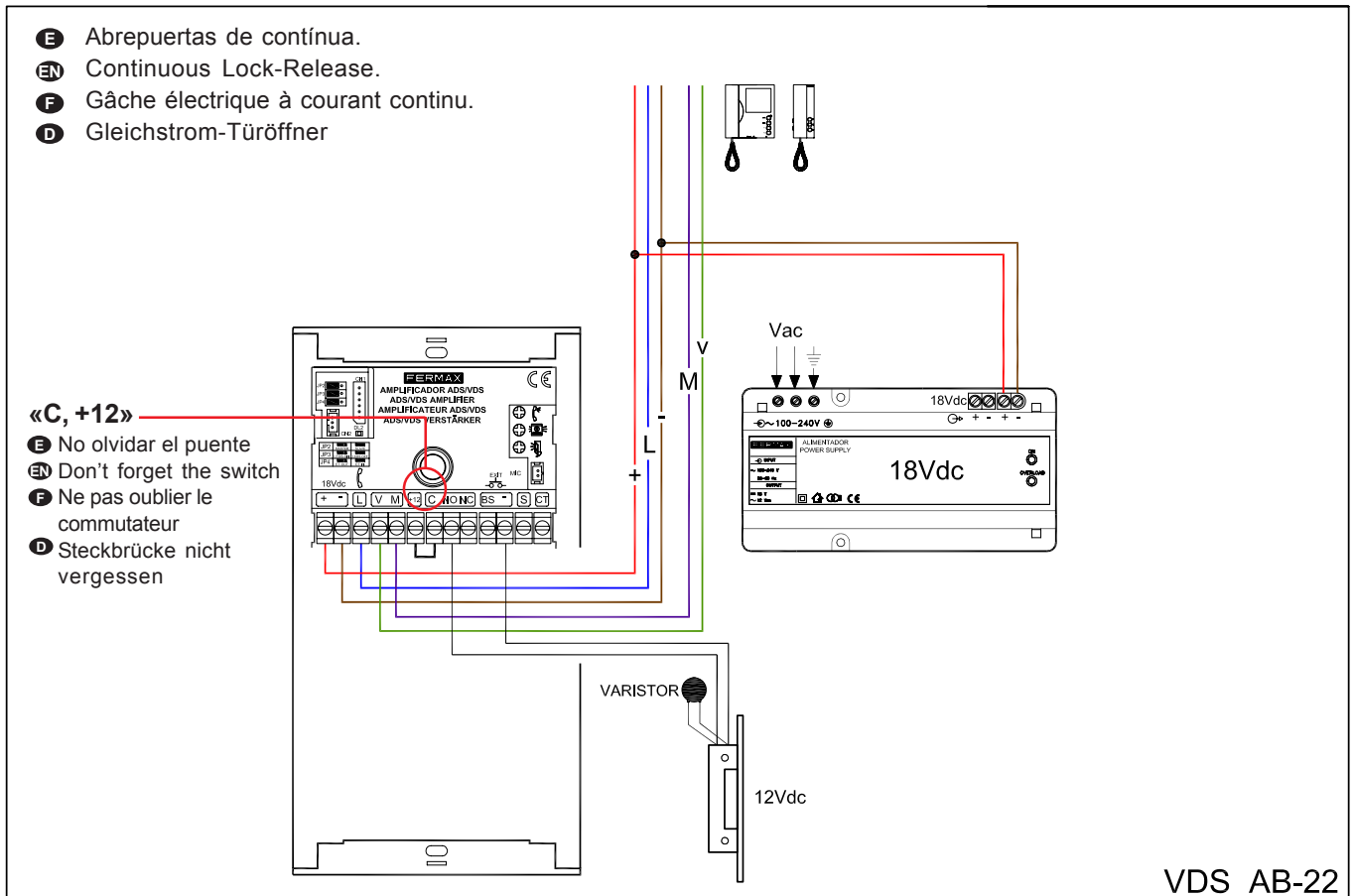
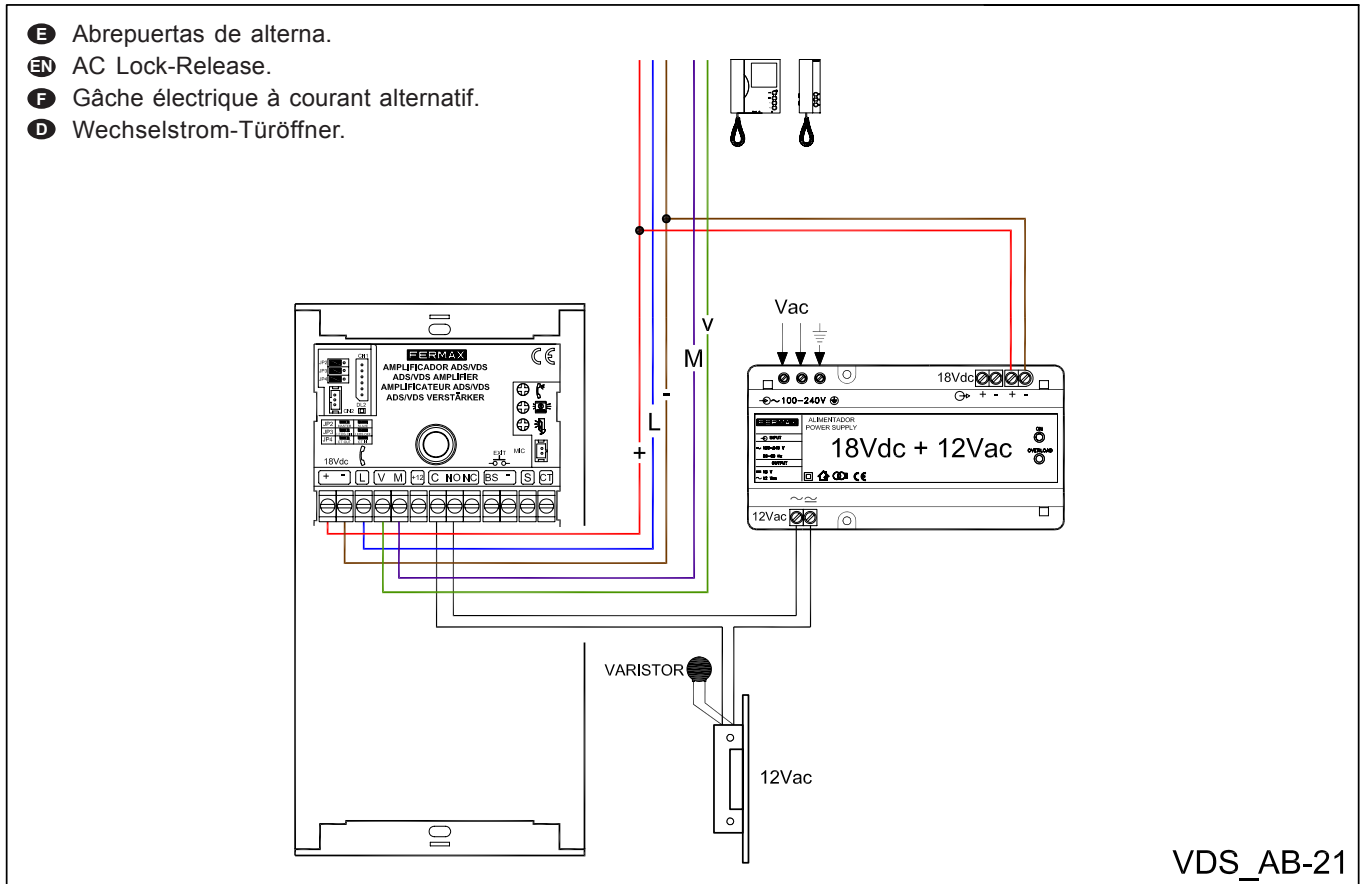
- Ⓔ Precableado. Placa VDS Modular (audio/video).
- Ⓔ Prewired. VDS modular panel (audio/video).
- Ⓕ Précâblage. Platine VDS modulaire (audio/vidéo).
- Ⓖ Vorverkabelung. Audio-/Videotürstation VDS Modular.



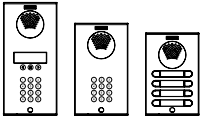
- E** Precableado. Placa VDS Direct y Digital (audio/video).
- EN** Prewired. VDS modular Direct and Digital panel (audio/video).
- F** Précâblage. Platine VDS Direct et Digital (audio/vidéo).
- D** Vorverkabelung. Audio-/Videotürstation VDS Direct und Digital.



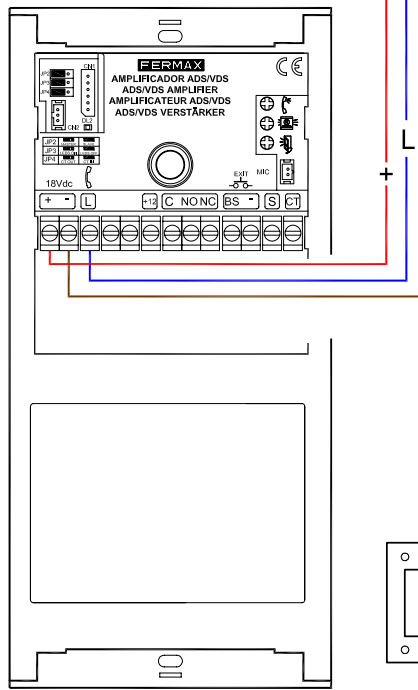
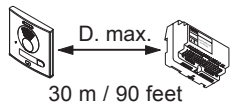
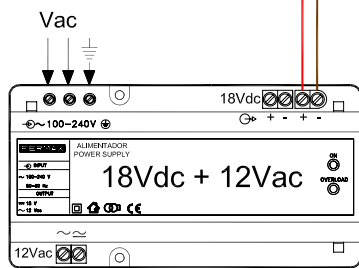
- E** Conexión abrepuertas. Placas VDS.
- EN** Lock-Release Connection. VDS Panels.
- F** Raccordement gâche. Platines VDS.
- D** Anschluss Türöffner. VDS-Türstationen VDS.



- E** Placa VDS. 1 acceso de audio.
- EN** VDS Panel. 1 audio access.
- F** Platines VDS. 1 accès audio.
- D** VDS-Türstationen. 1 Zutritt mit Audio.



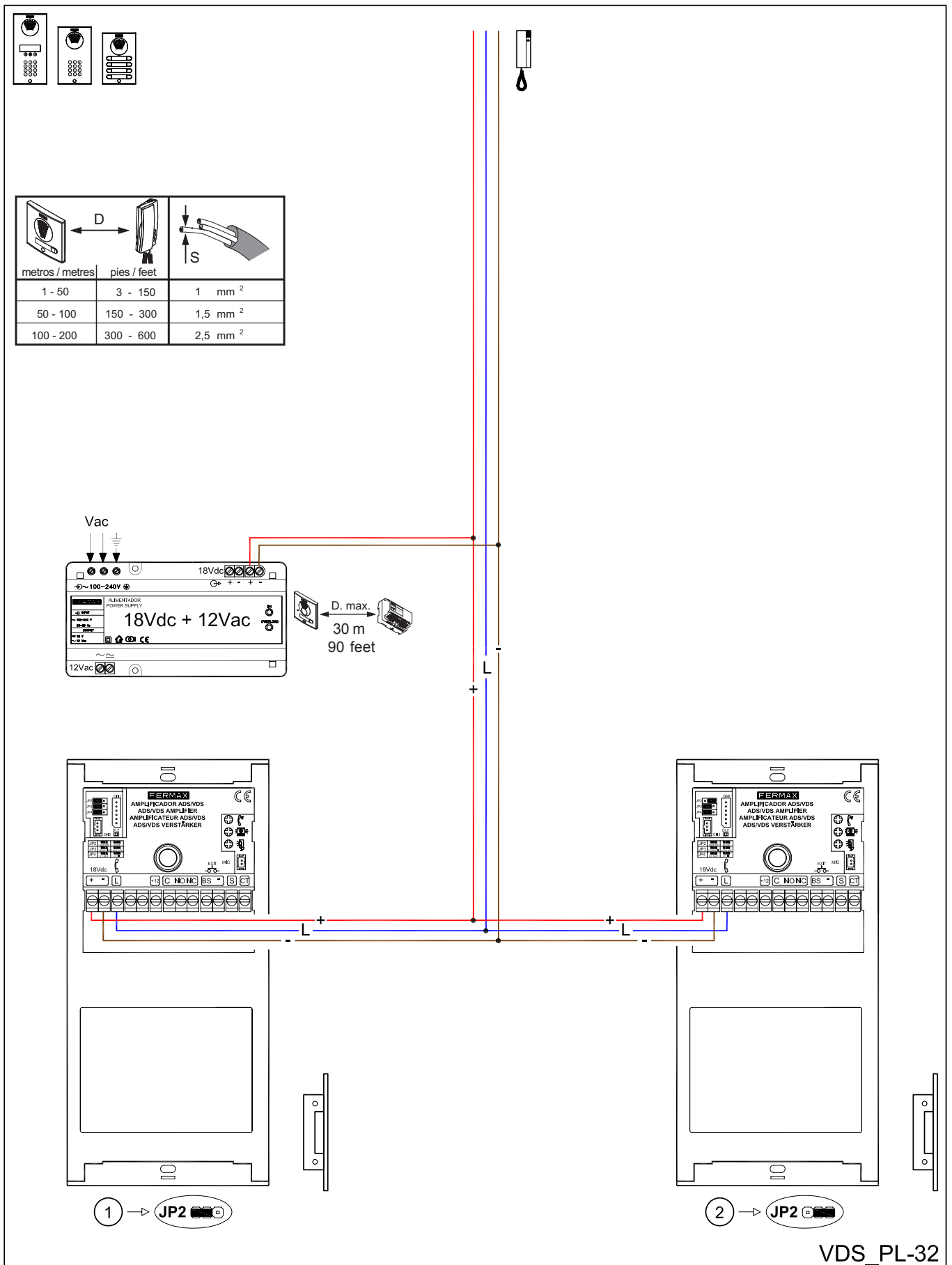
metros / metres	pies / feet	
1 - 50	3 - 150	1 mm ²
50 - 100	150 - 300	1,5 mm ²
100 - 200	300 - 600	2,5 mm ²



1 → JP2 **E**

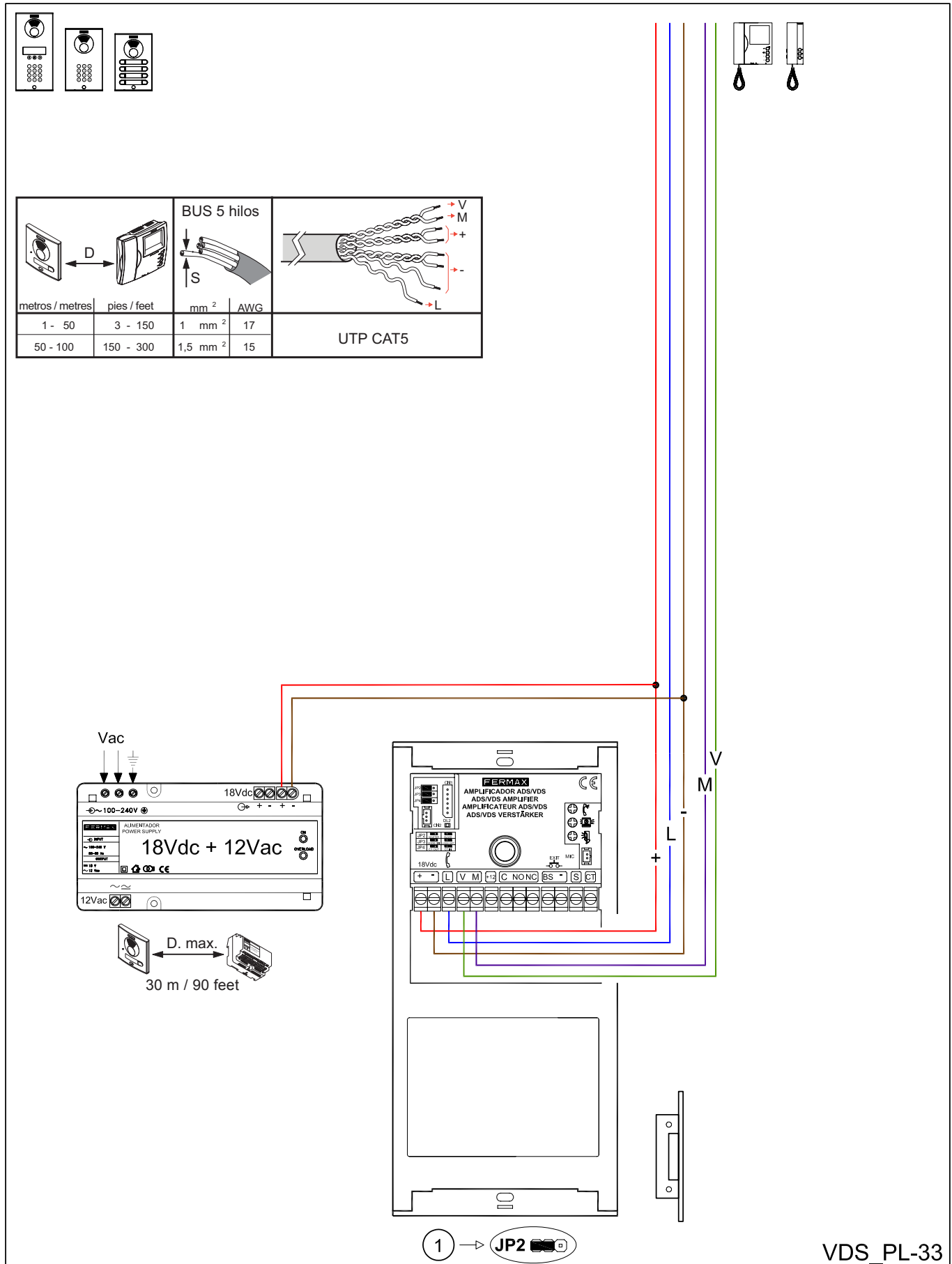
VDS_PL-31

- E** Placa VDS. 2 accesos de audio.
- EN** VDS Panel. 2 audio access.
- F** Platines VDS. 2 accès audio.
- D** VDS-Türstationen. 2 Zutritte mit Audio.

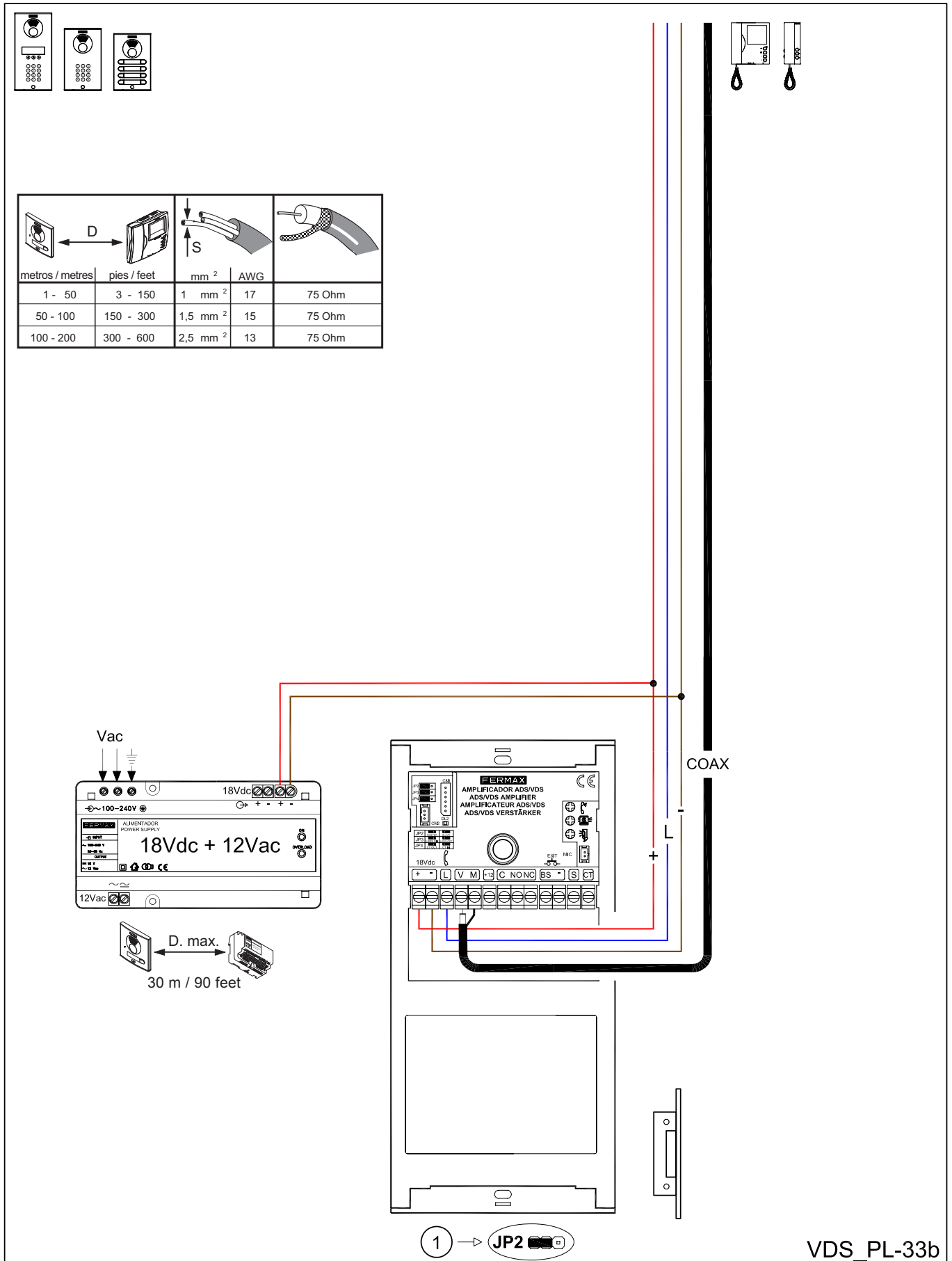


VDS_PL-32

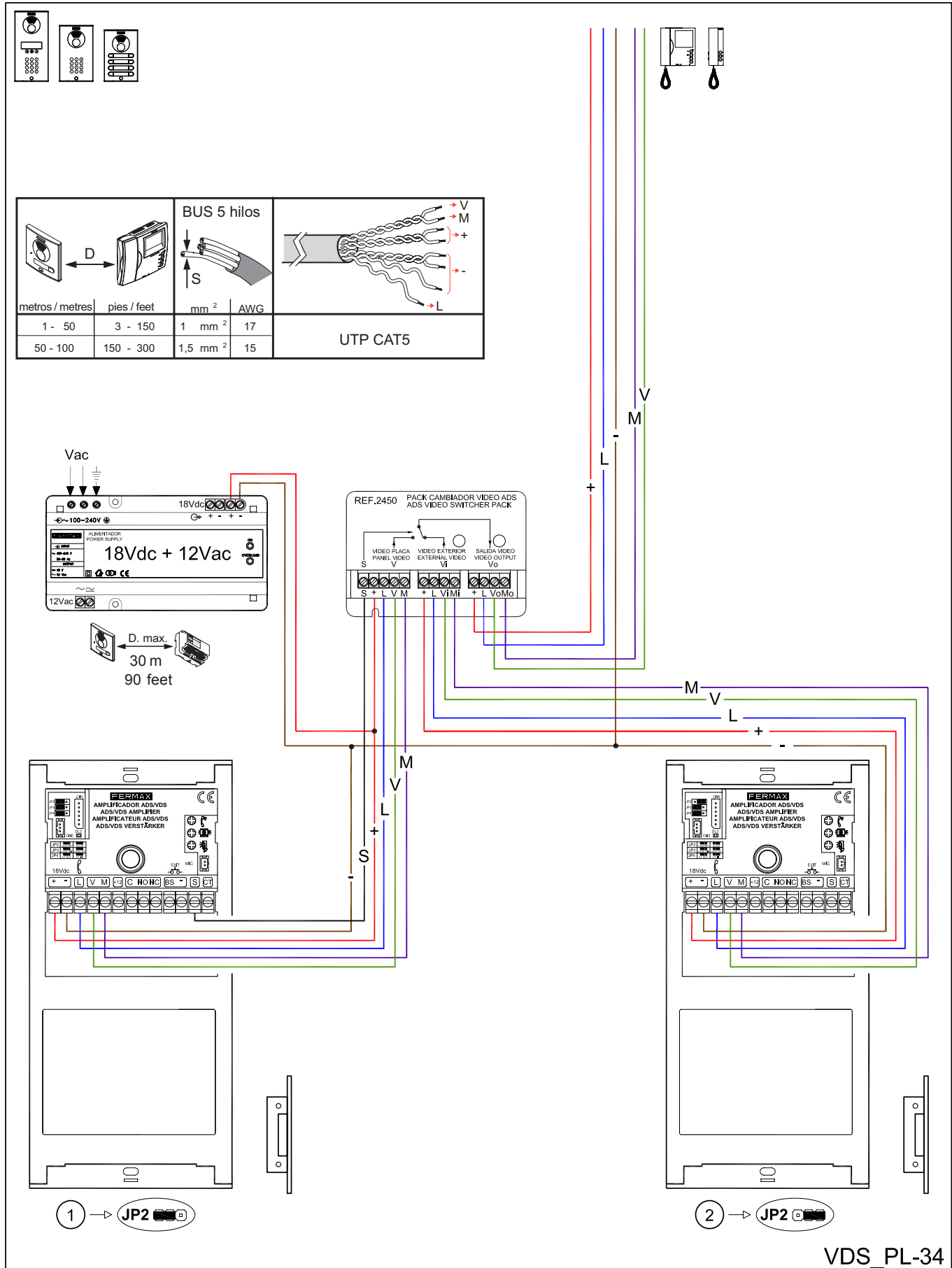
- E** Placa VDS. 1 acceso de video.
- EN** VDS Panels. 1 video access.
- F** Platines VDS. 1 accès vidéo.
- D** Türstation VDS. 1 Zutritt mit Videotürstation.



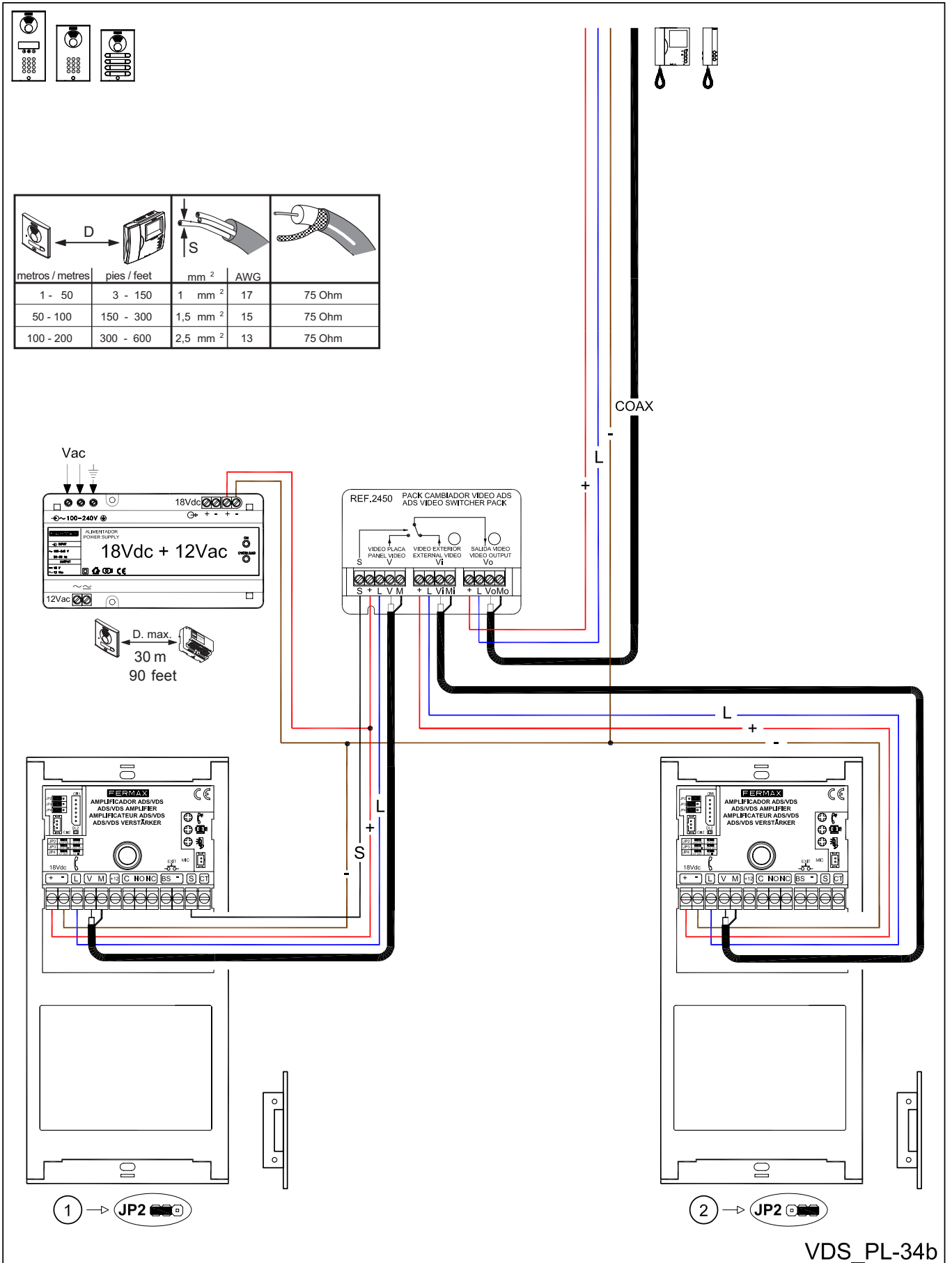
- E** Placa VDS. 1 acceso de video (coaxial)
- EN** VDS Panels. 1 video access (coaxial).
- F** Platines VDS. 1 accès vidéo (coaxial).
- D** Türstation VDS. 1 Zutritt mit Videotürstation (Koaxial).



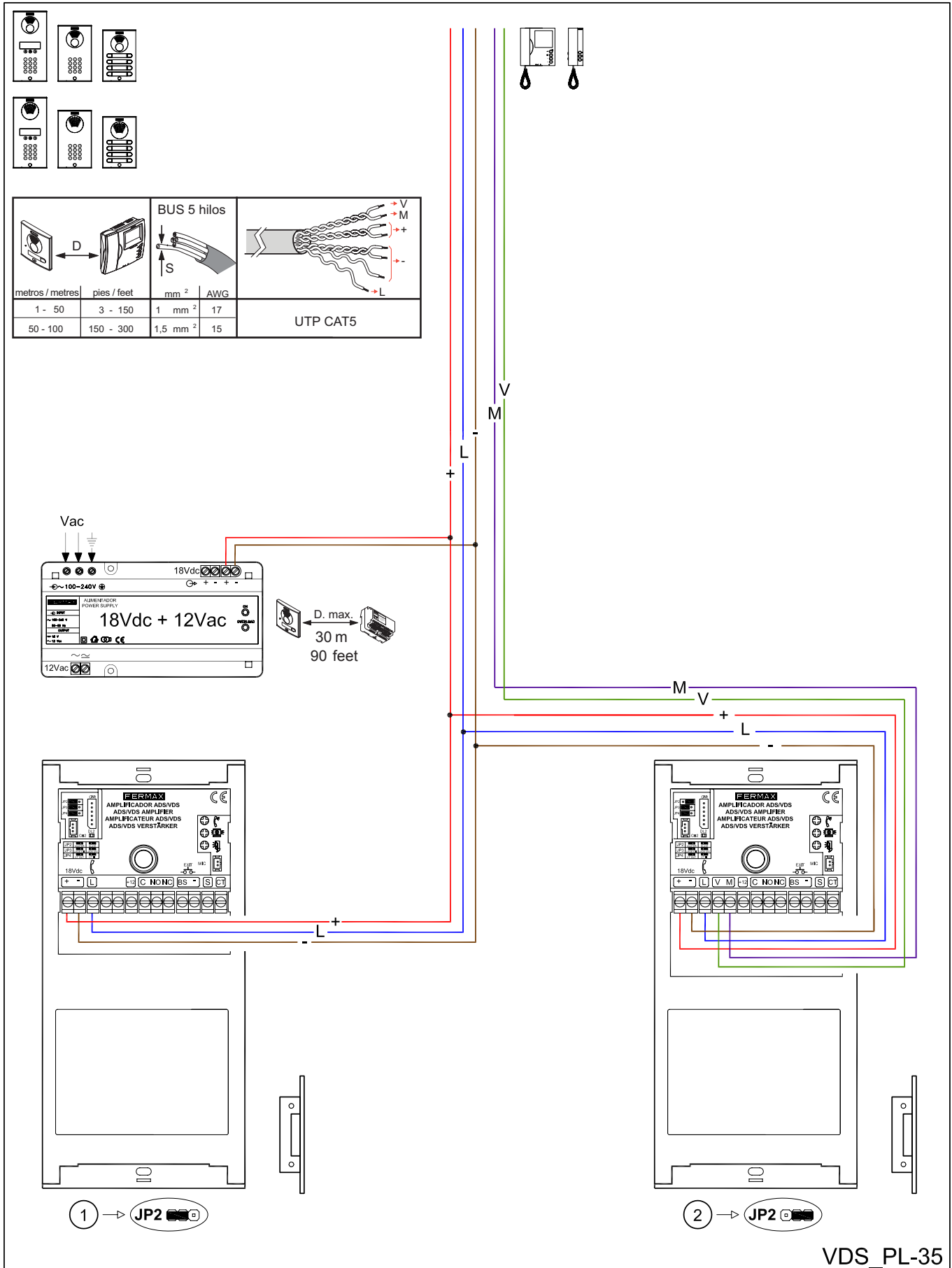
- E** Placa VDS. 2 accesos de video.
- EN** VDS Panels. 2 video access.
- F** Platines VDS. 2 accès vidéo.
- D** Türstation VDS. 2 Zutritte mit Videotürstation.



- E** Placa VDS. 2 accesos de video (coaxial).
- EN** VDS Panels. 2 video access (coaxial).
- F** Platines VDS. 2 accès vidéo (coaxial).
- D** Türstation VDS. 2 Zutritt mit Videotürstation (Koaxial).

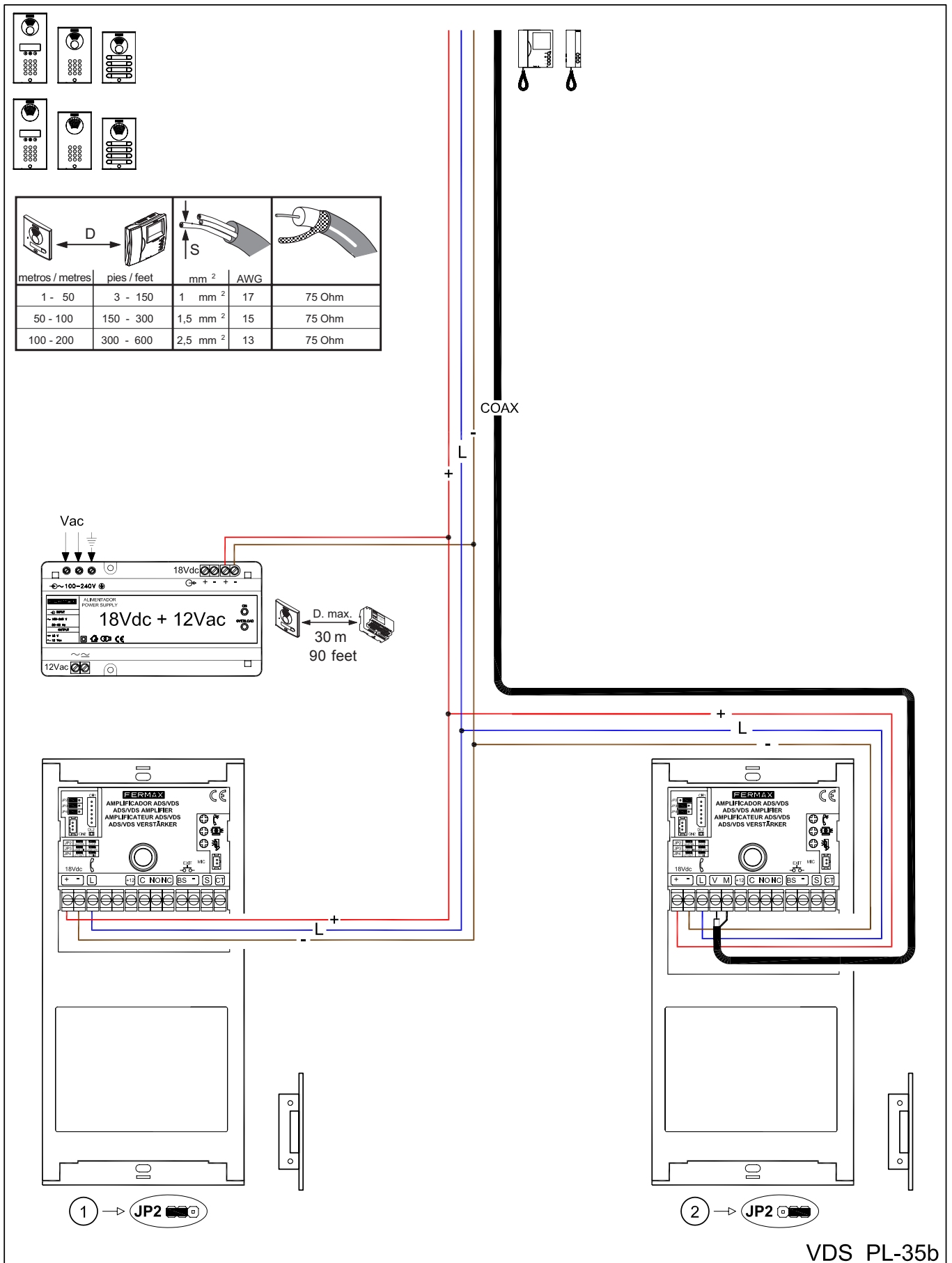


- E** Placa VDS. 2 accesos: Audio + Video.
- EN** VDS Panels. 2 access: Audio + Video.
- F** Platines VDS. 2 accès: Audio + Vidéo.
- D** Türstation VDS. 2 Zutritt: audio + Video.



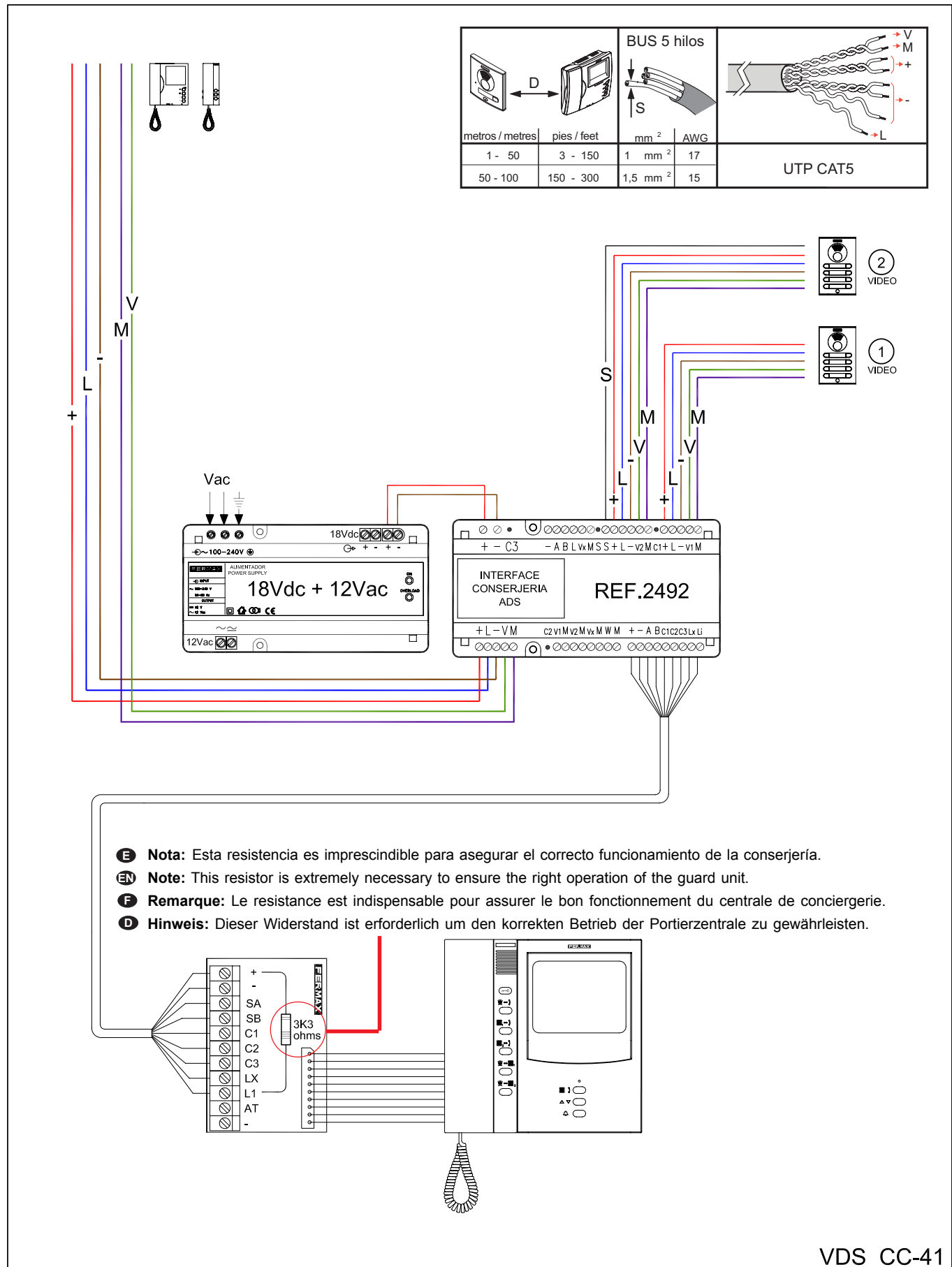
VDS_PL-35

- E** Placa VDS. 2 accesos: Audio + Video (coaxial)
- EN** VDS Panels. 2 access: Audio + Video (coaxial).
- F** Platines VDS. 2 accès: Audio + Vidéo (coaxial).
- D** Türstation VDS. 2 Zutritt: audio + Video (Koaxial).

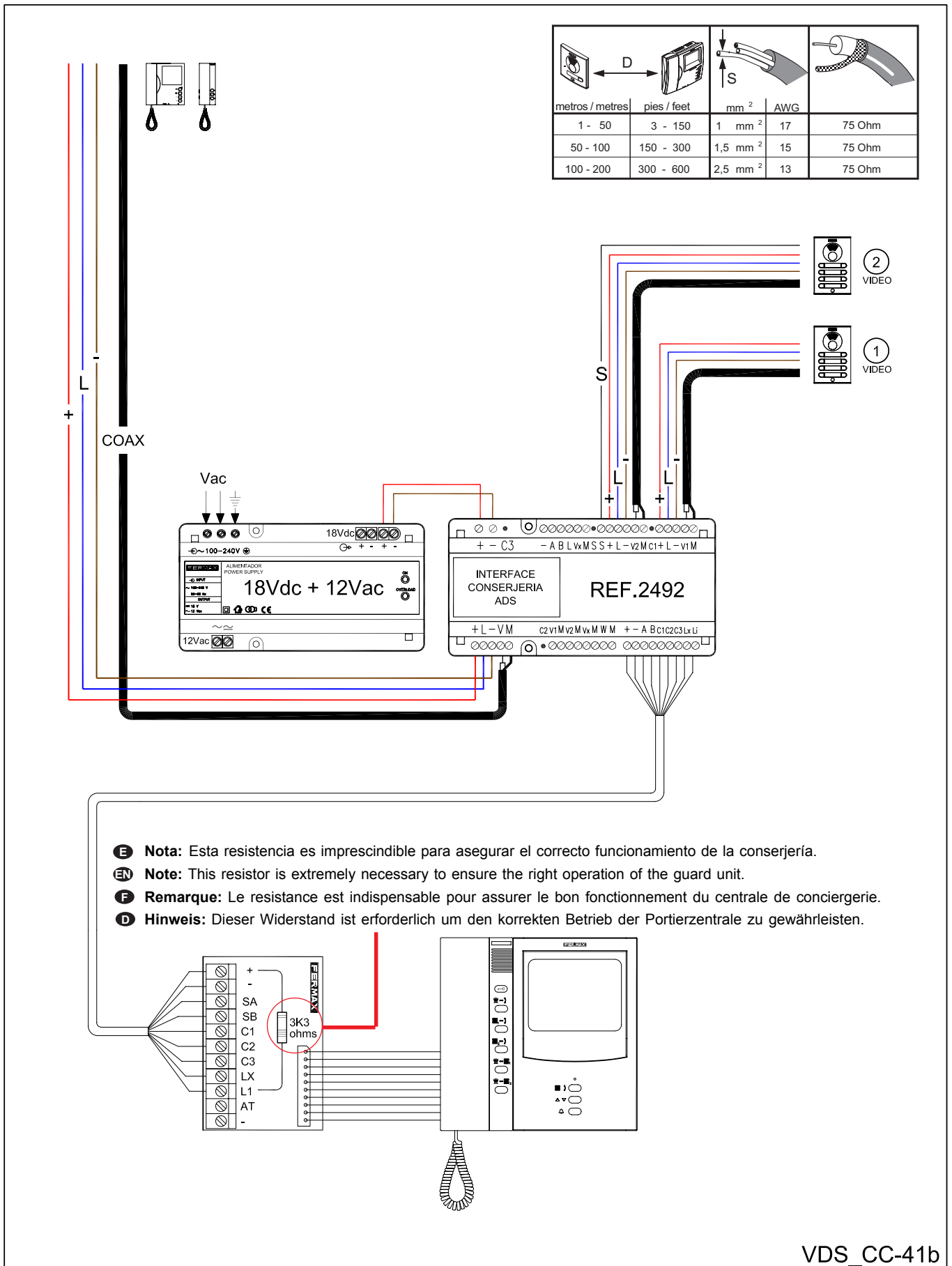


VDS_PL-35b

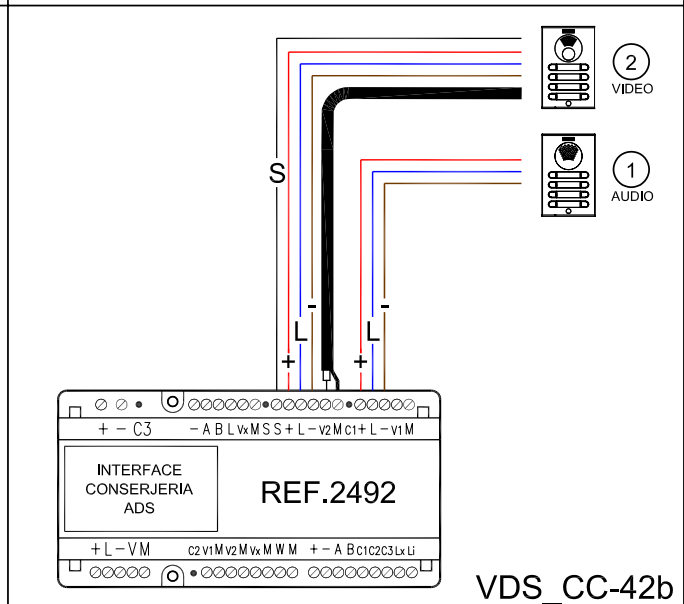
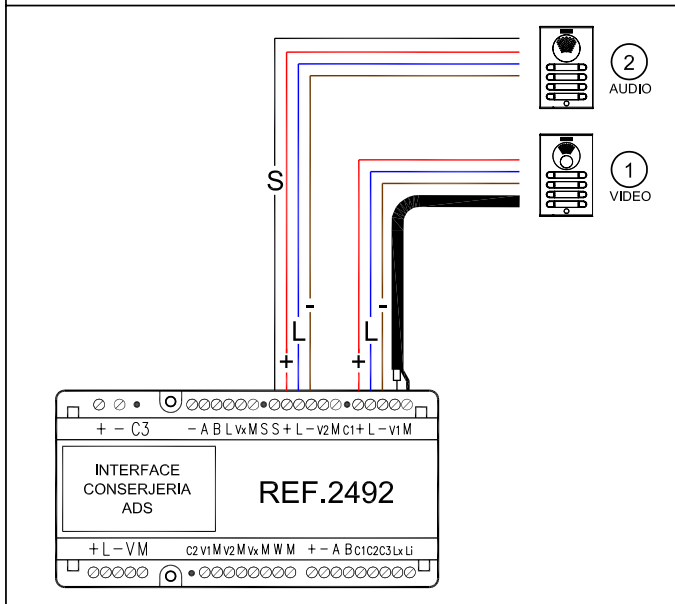
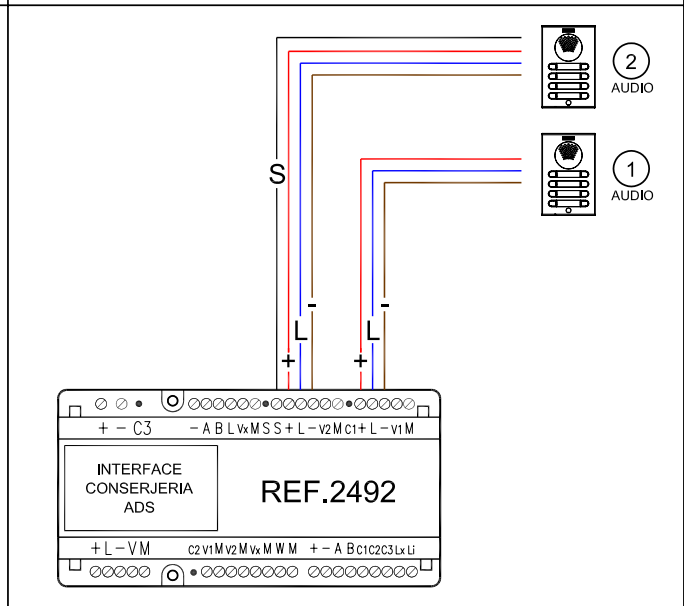
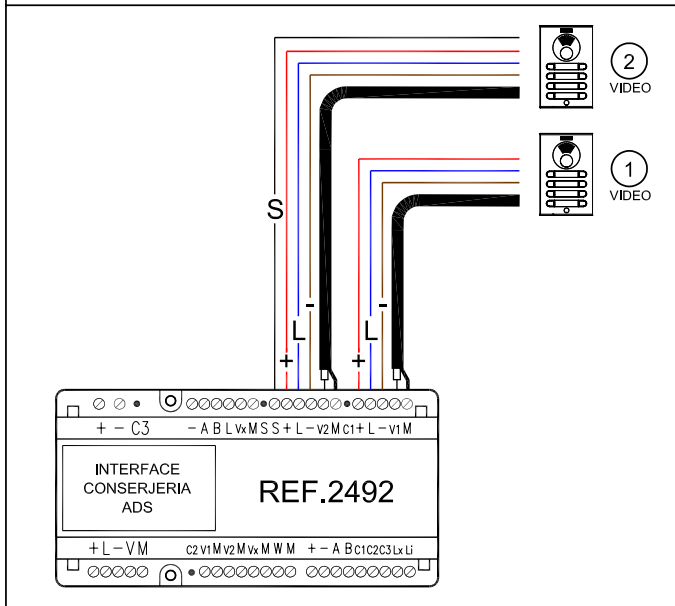
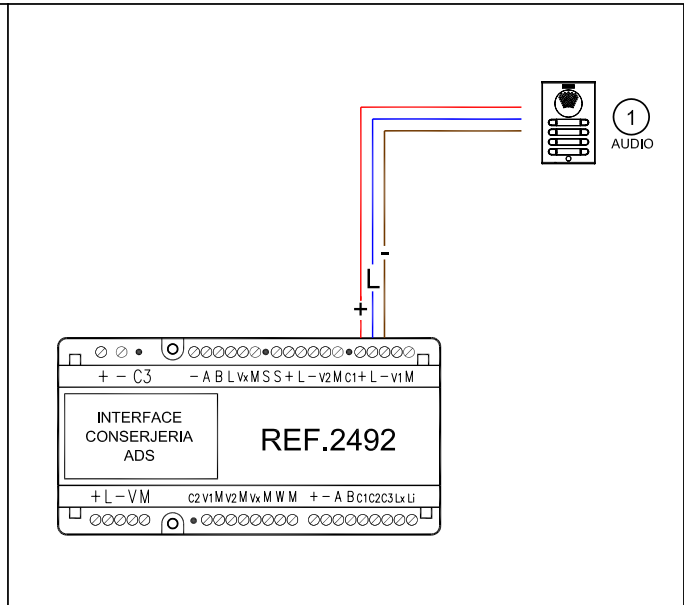
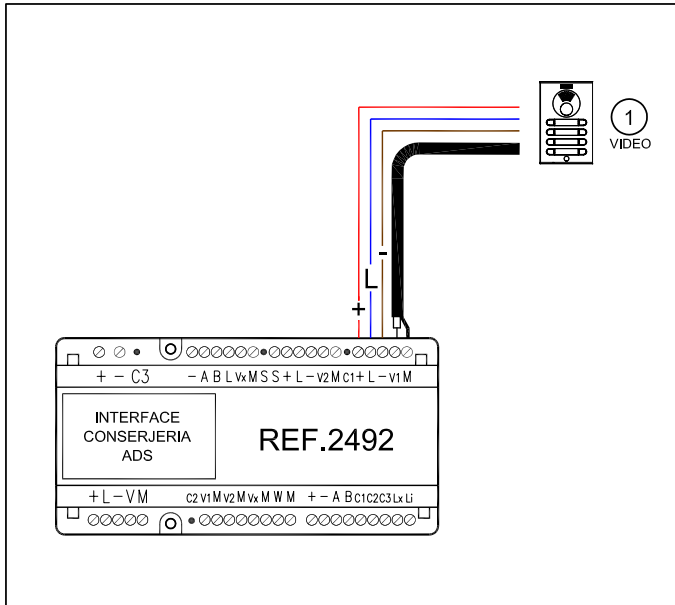
- E** Central de conserjería VDS. Esquema general.
- EN** Concierge central for VDS. General diagram
- F** Central de conciergerie VDS. Schéma general.
- D** VDS Portierzentrale. Generelle Schaltpläne.



- E** Central de conserjería VDS. Esquema general (coaxial).
- EN** Concierge central for VDS. General diagram (coaxial).
- F** Central de conciergerie VDS. Schéma general (coaxial).
- D** VDS Portierzentrale. Generelle Schaltpläne (Koaxial).

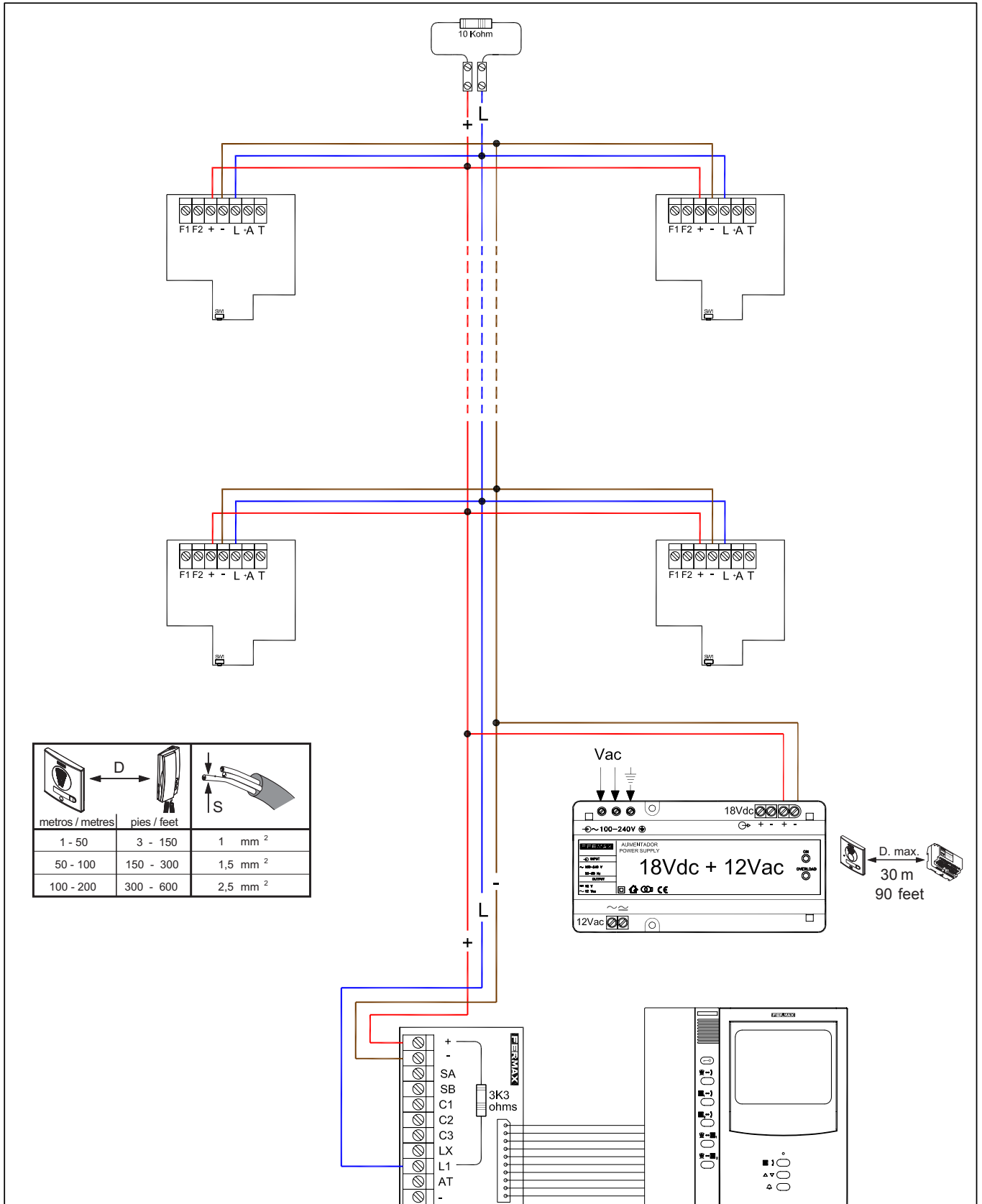


- E** Central de conserjería VDS. Módulo de conexiones (coaxial).
- EN** Concierge central for VDS. Connection modules (coaxial)
- F** Central de conciergerie VDS. Schéma de connexion (coaxial).
- D** VDS Portierzentrale. Anschlussmodul (Koaxial).



VDS_CC-42b

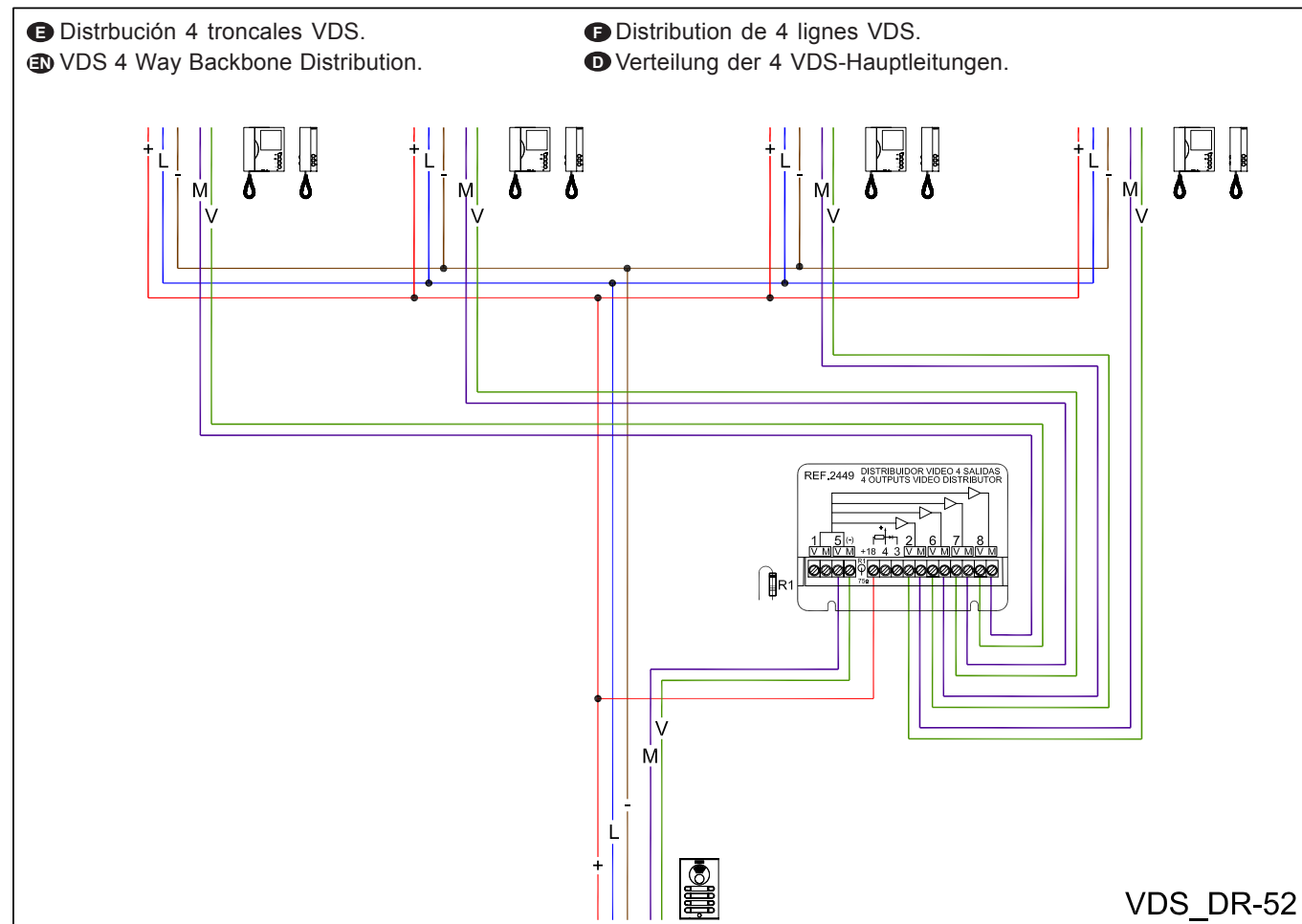
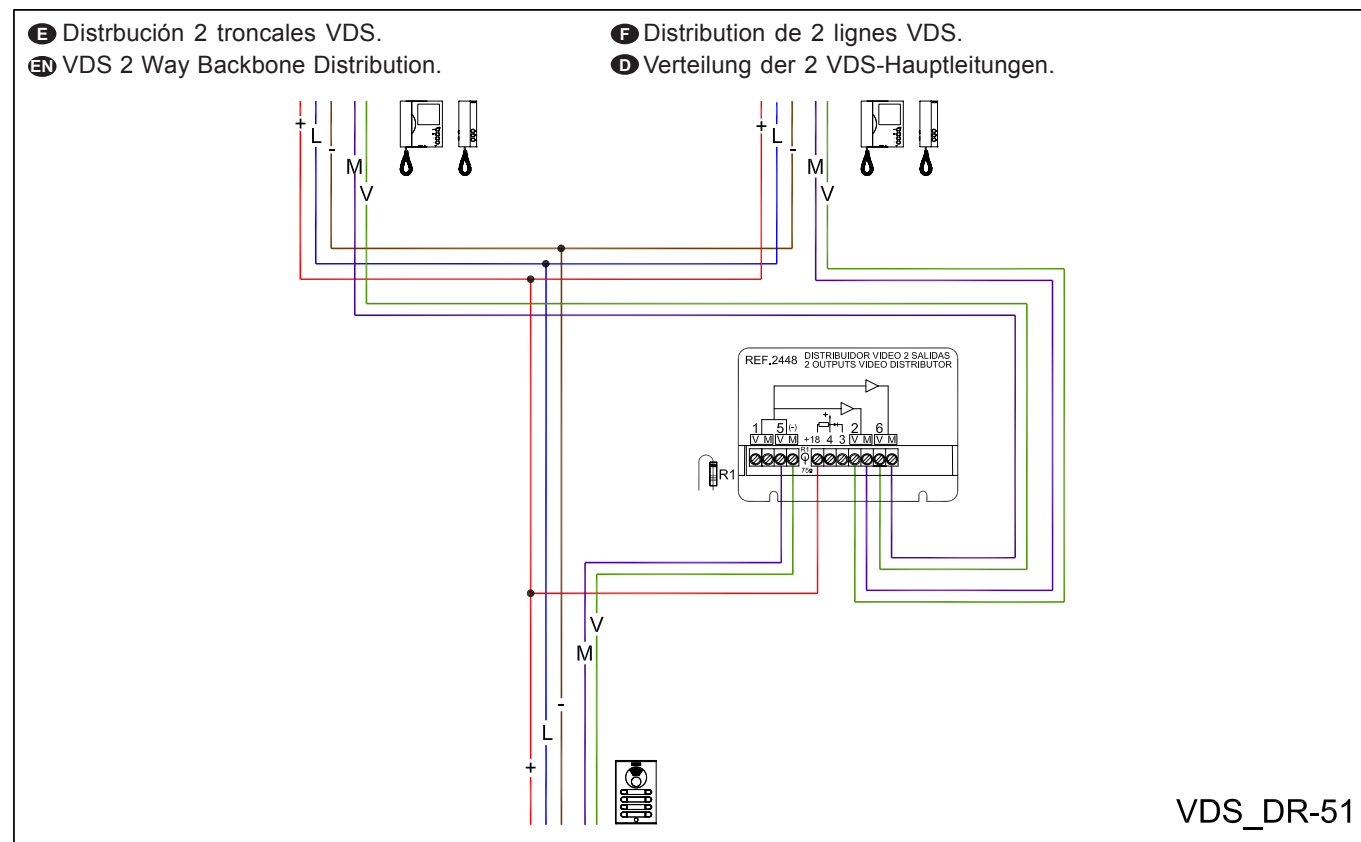
- E** Central de conserjería VDS. Intercomunicación
- EN** VDS Central Guard Unit. Intercommunication.
- F** Centrale de conciergerie VDS. Intercommunication.
- D** VDS Pförtnerzentral. Intersprechen.



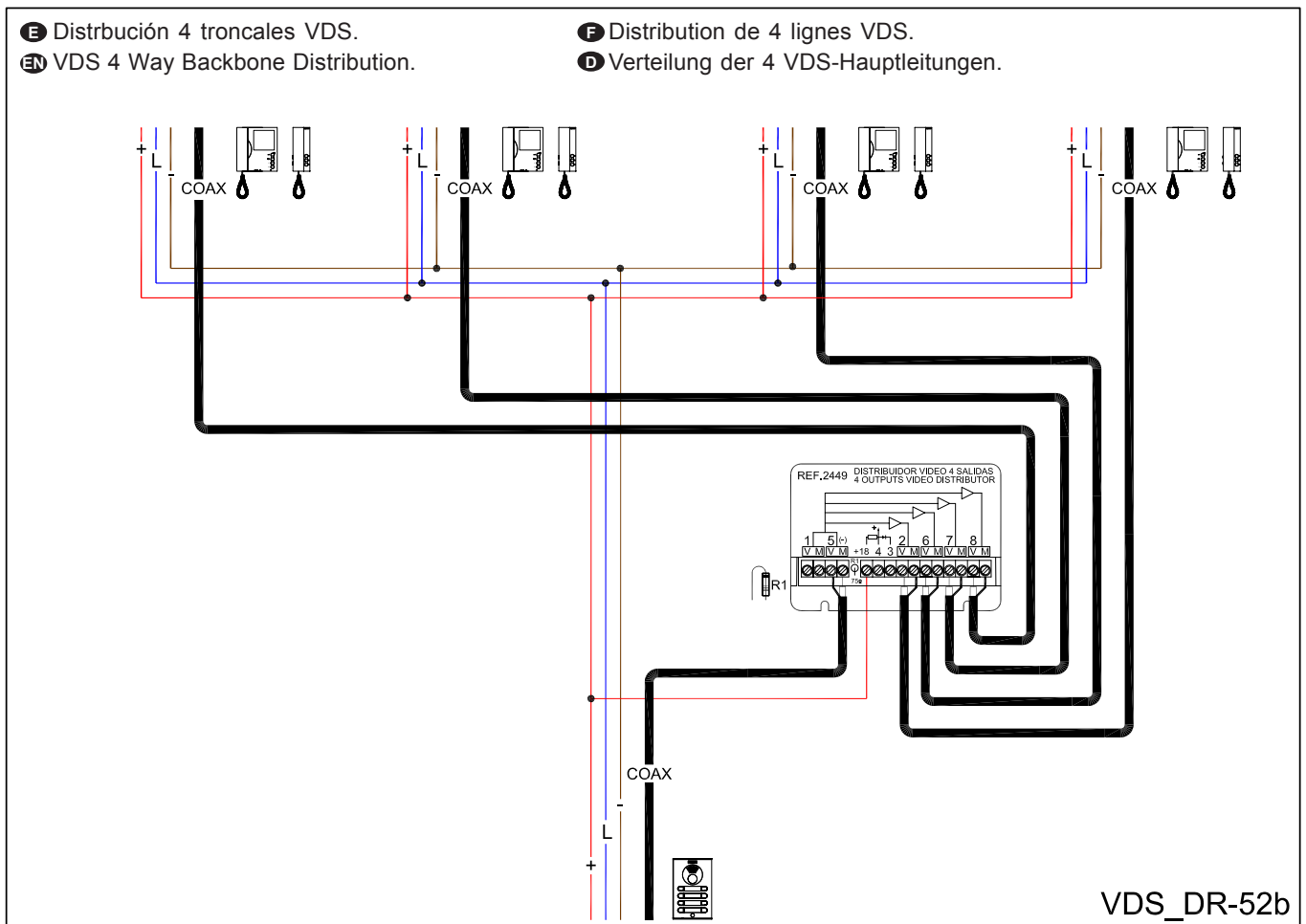
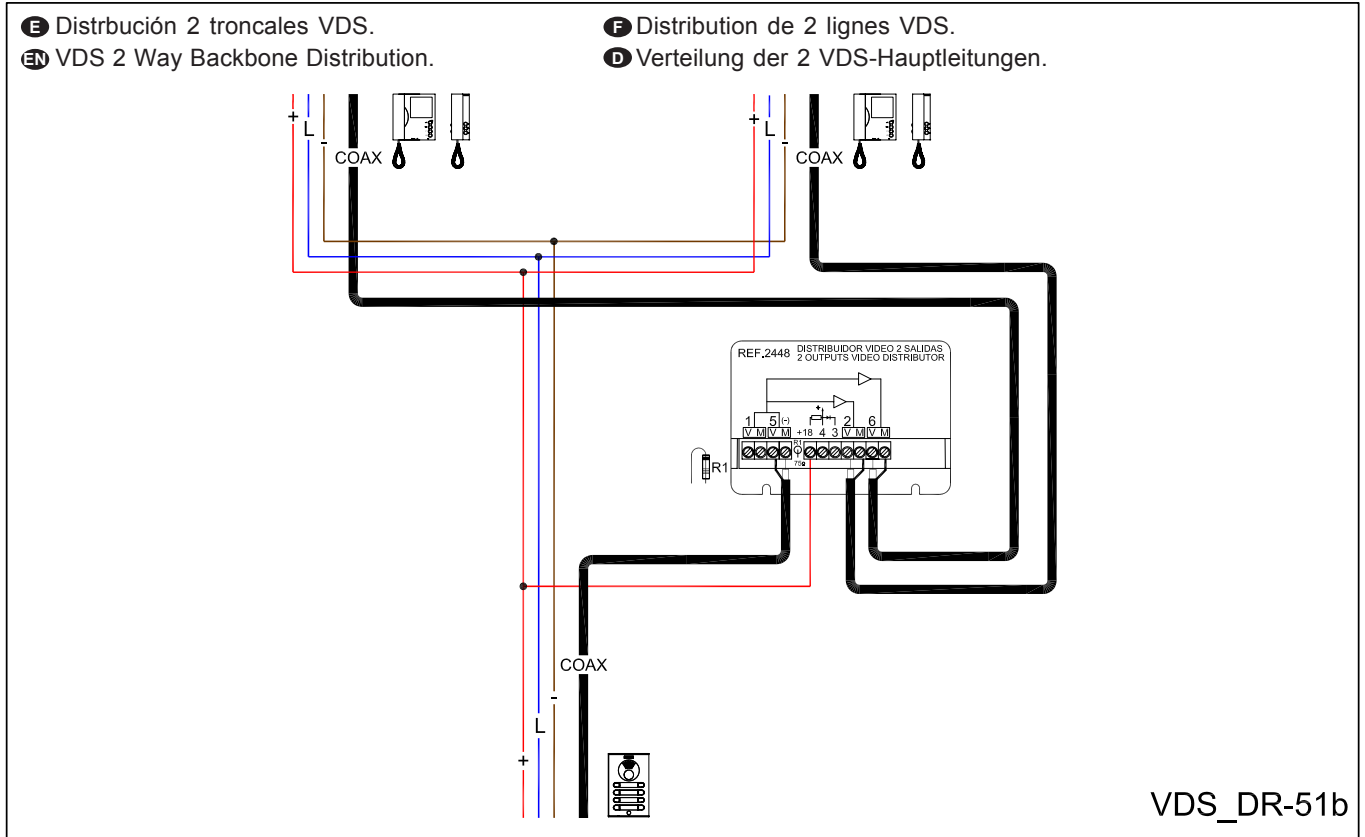
- E** **Nota:** Esta resistencia es imprescindible para asegurar el correcto funcionamiento de la conserjería.
- EN** **Note:** This resistor is extremely necessary to ensure the right operation of the guard unit.
- F** **Remarque:** Le resistance est indispensable pour assurer le bon fonctionnement du centrale de conciergerie.
- D** **Hinweis:** Dieser Widerstand ist erforderlich um den korrekten Betrieb der Portierzentrale zu gewährleisten.

VDS_CC-43

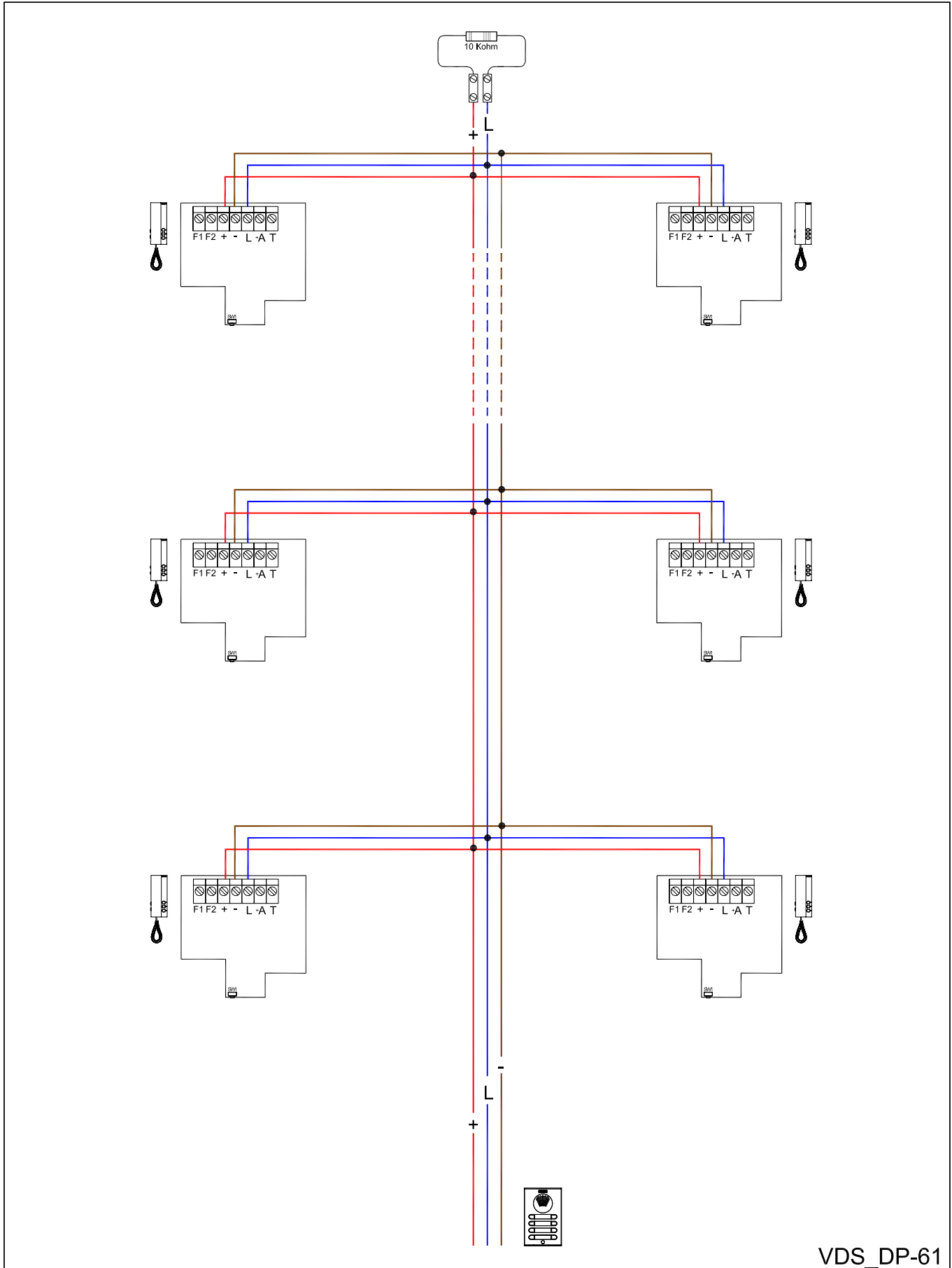
- E** Distribución troncales VDS.
- EN** VDS Backbone Distribution.
- F** Distribution des lignes VDS.
- D** Verteilung der VDS-Hauptleitung.



- E Distribución troncales VDS (coaxial).
- EN VDS Backbone Distribution (coaxial).
- F Distribution des lignes VDS (coaxial).
- D Verteilung VDS-Hauptleitung (coaxial).

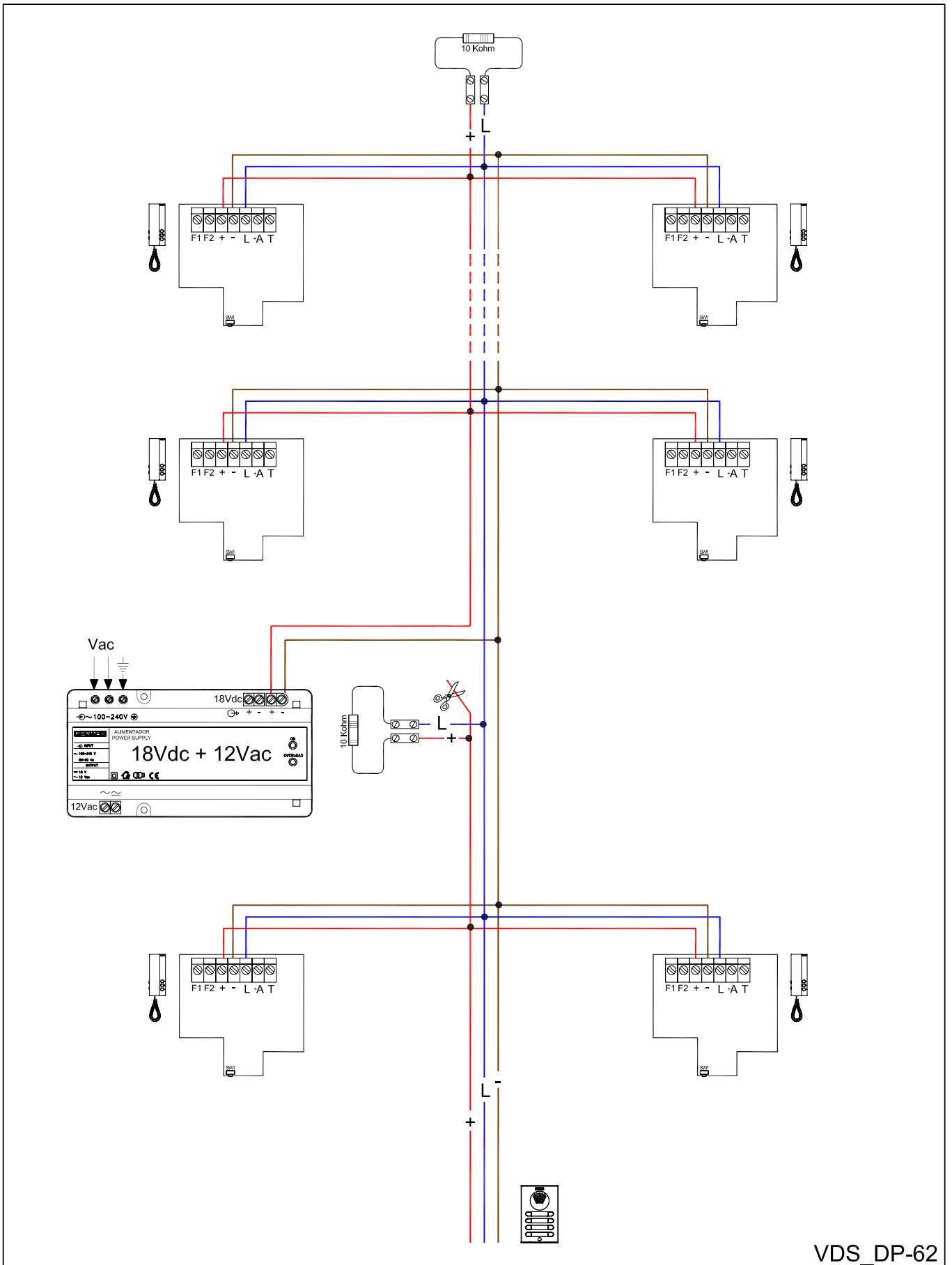


- Ⓔ Distribución Plantas de Audio.
- Ⓔ Audio Distribution.
- Ⓔ Distribution étages audio.
- Ⓔ Stockverteilung Audio.

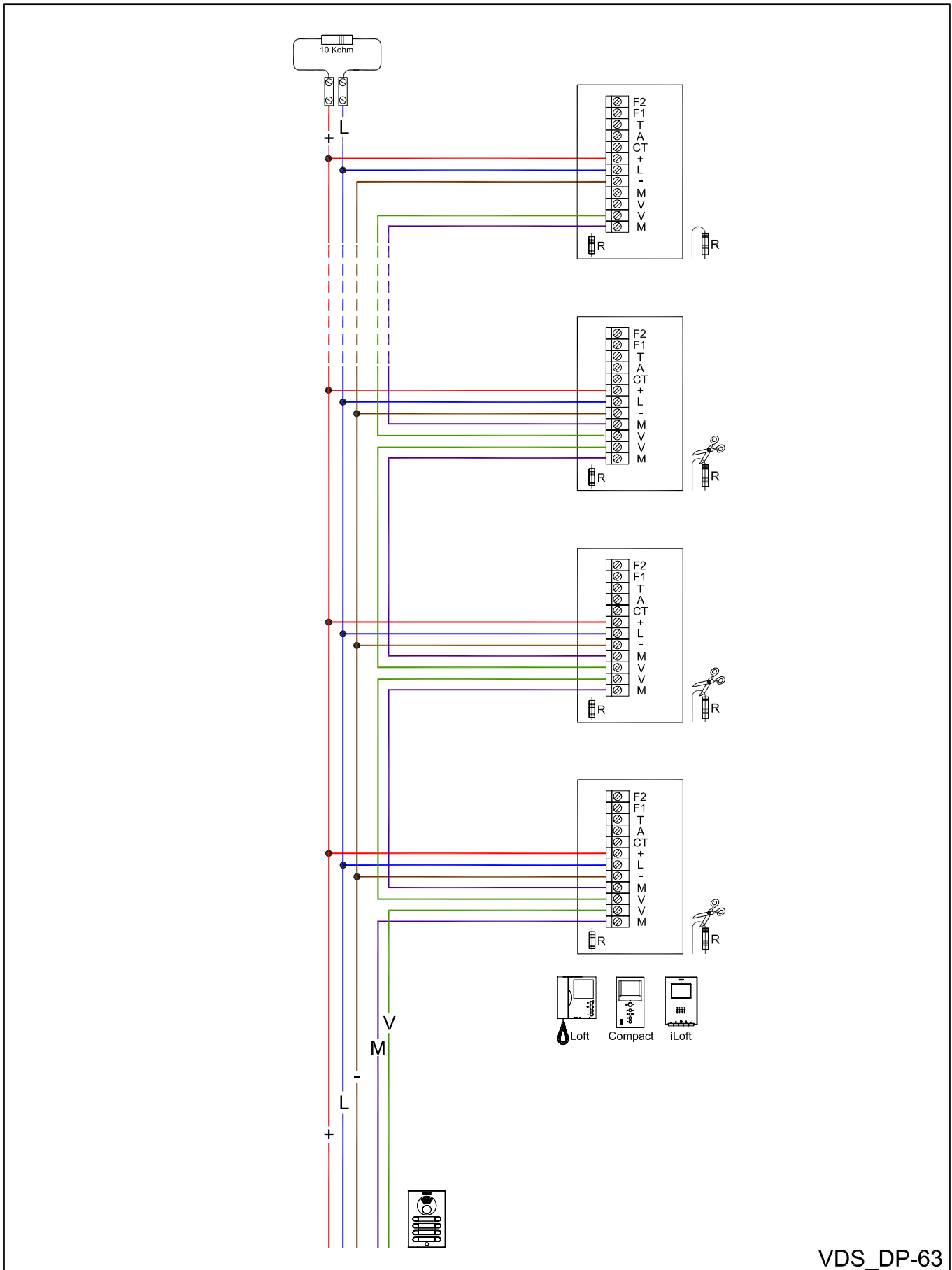


VDS_DP-61

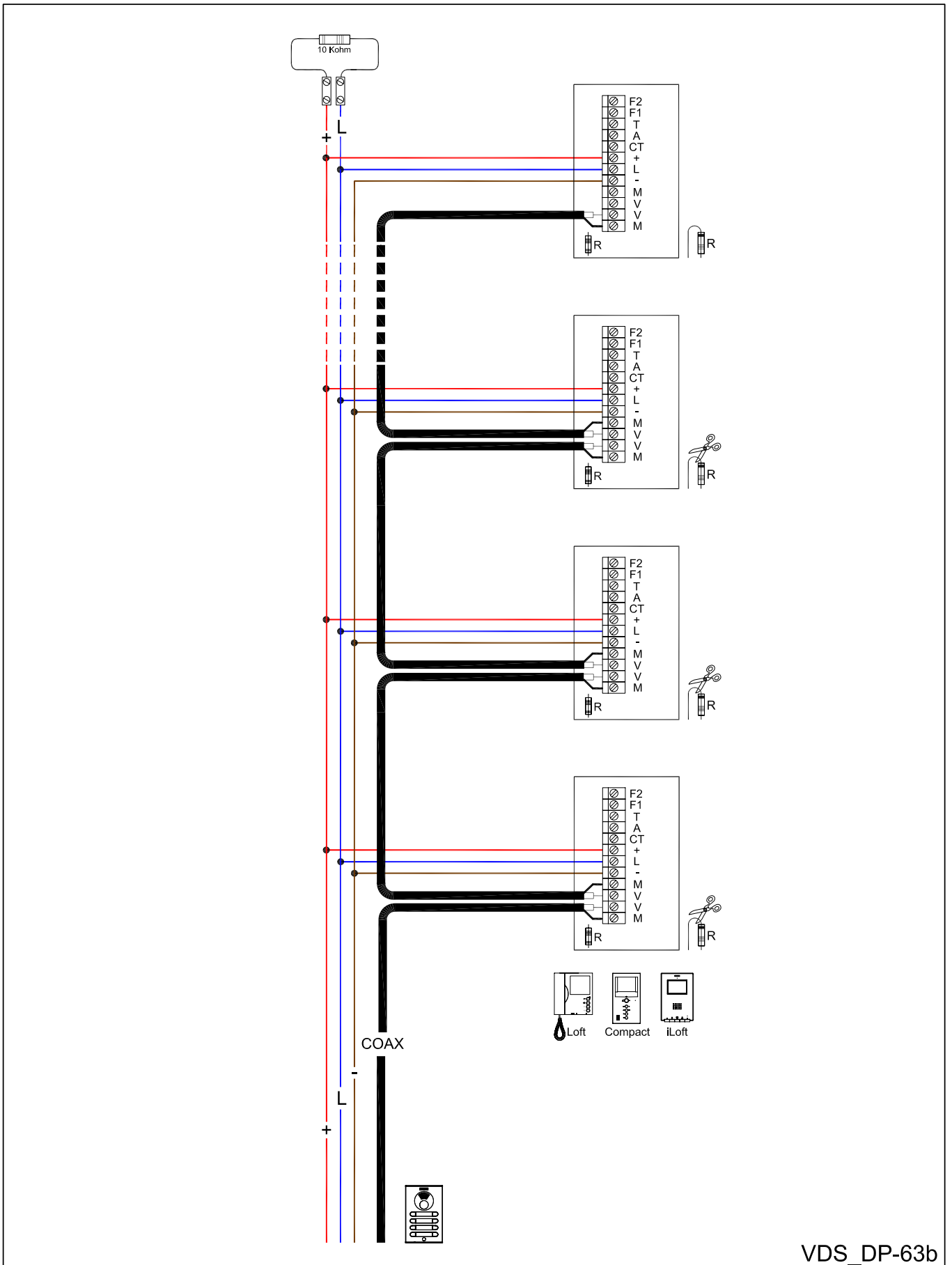
- Ⓔ Distribución Plantas de Audio. Alimentación adicional.
- Ⓔ Audio Distribution. Additional Power Supply.
- Ⓕ Distribution étages audio. Alimentation supplémentaire.
- Ⓖ Stockverteilung Audio. Zusatzstromversorgung.



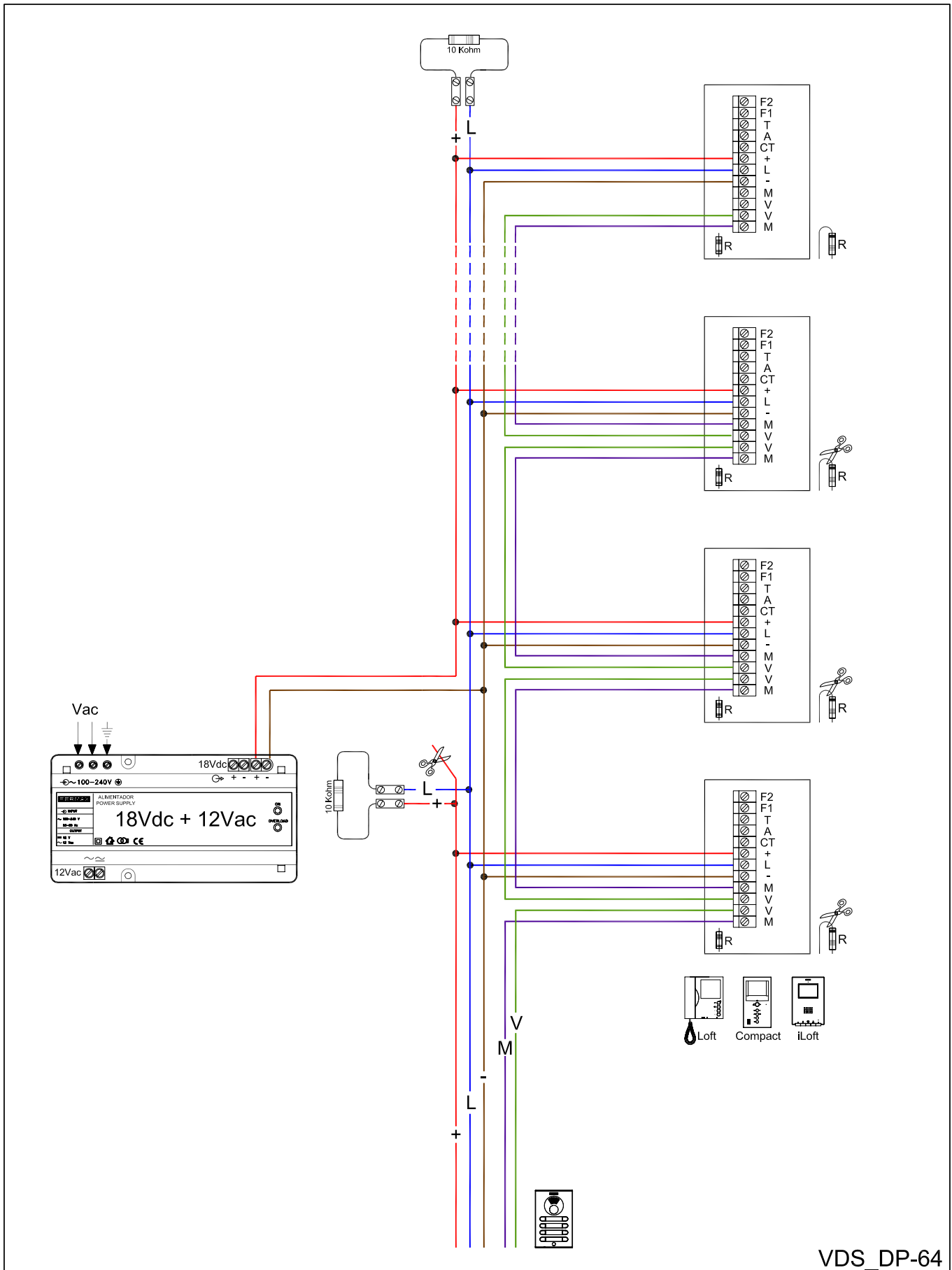
- E** Plantas de Video. En cascada.
- EN** Video distribution. In cascade.
- F** Distribution étages vidéo. En cascade.
- D** Videoetage. In Kaskade.



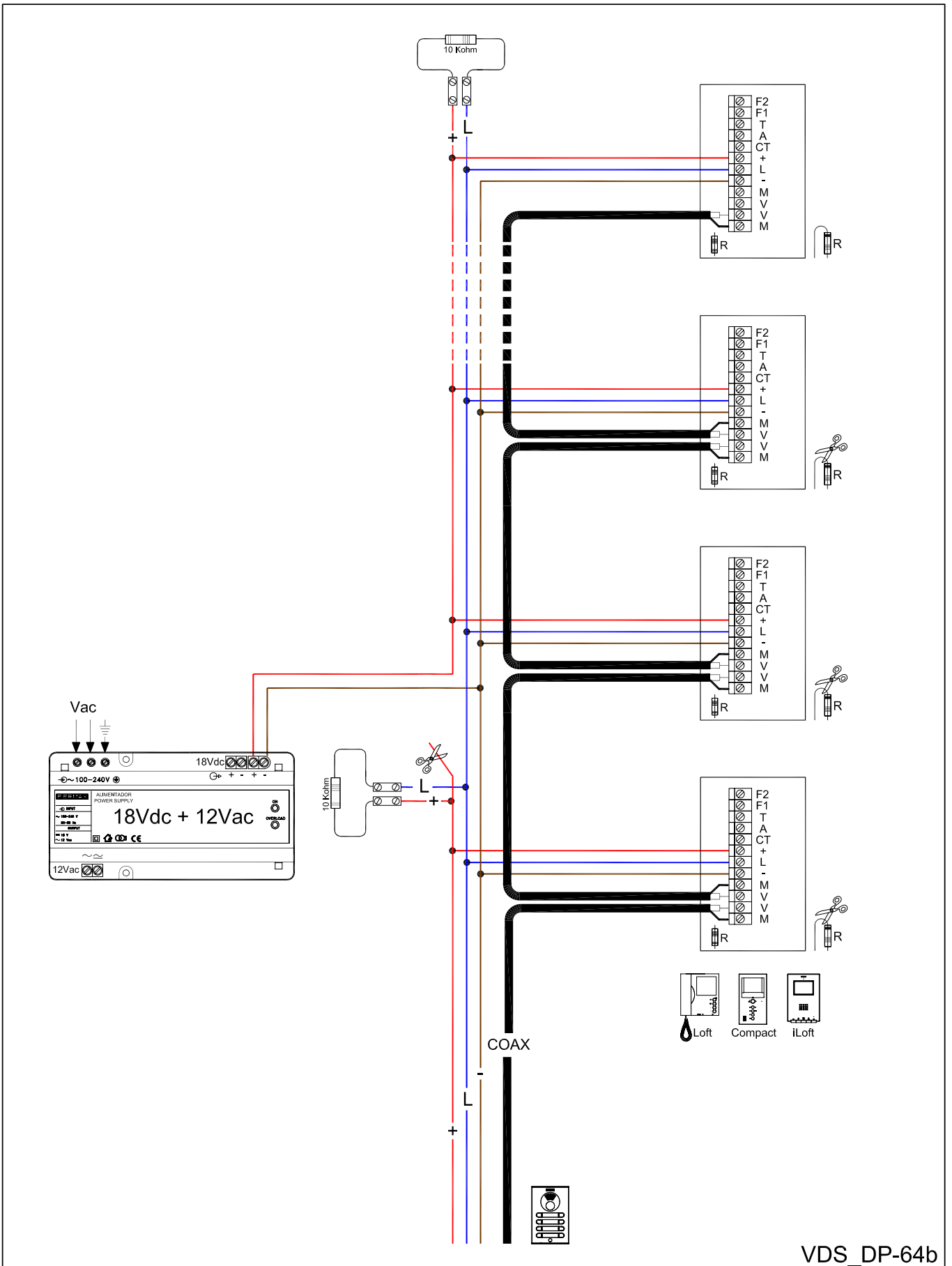
- E Plantas de Video. En cascada (coaxial)
- EN Video distribution. In cascade (coaxial).
- F Distribution étages vidéo. En cascade (coaxial).
- D Videoetage. In Kaskade (Koaxial).



- E Plantas de Video. En cascada. Alimentación adicional.
- EN Video distribution. In cascade. Additional Power Supply.
- F Distribution étages vidéo. En cascade. Alimentation supplémentaire.
- D Videoetage. In Kaskade. Zusatzstromversorgung.

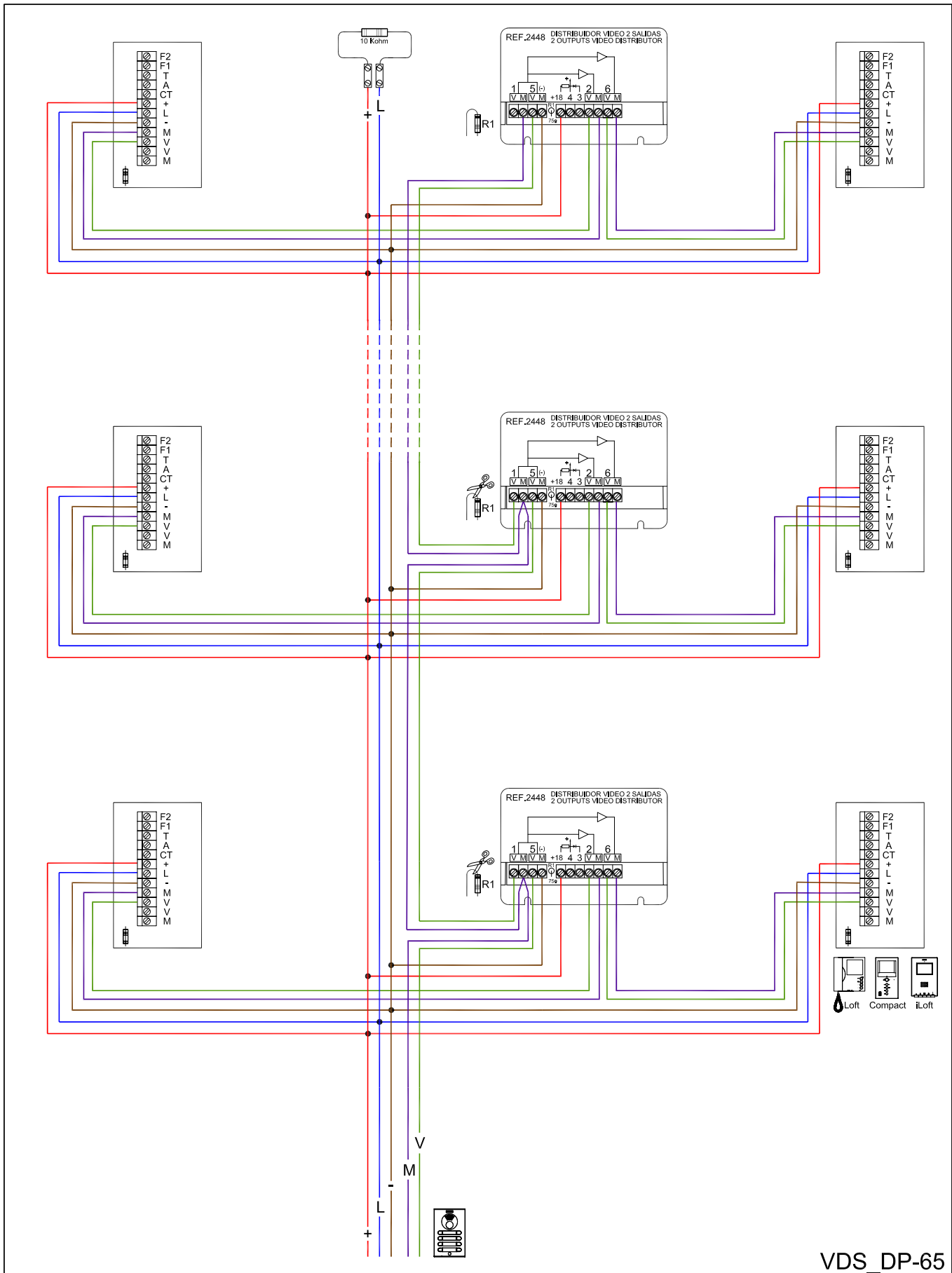


- E Plantas de Video. En cascada (coaxial). Alimentación adicional.
- EN Video distribution. In cascade (coaxial). Additional Power Supply.
- F Distribution étages vidéo. En cascade (coaxial). Alimentation supplémentaire.
- D Videoetage. In Kaskade (Koaxial). Zusatzstromversorgung.



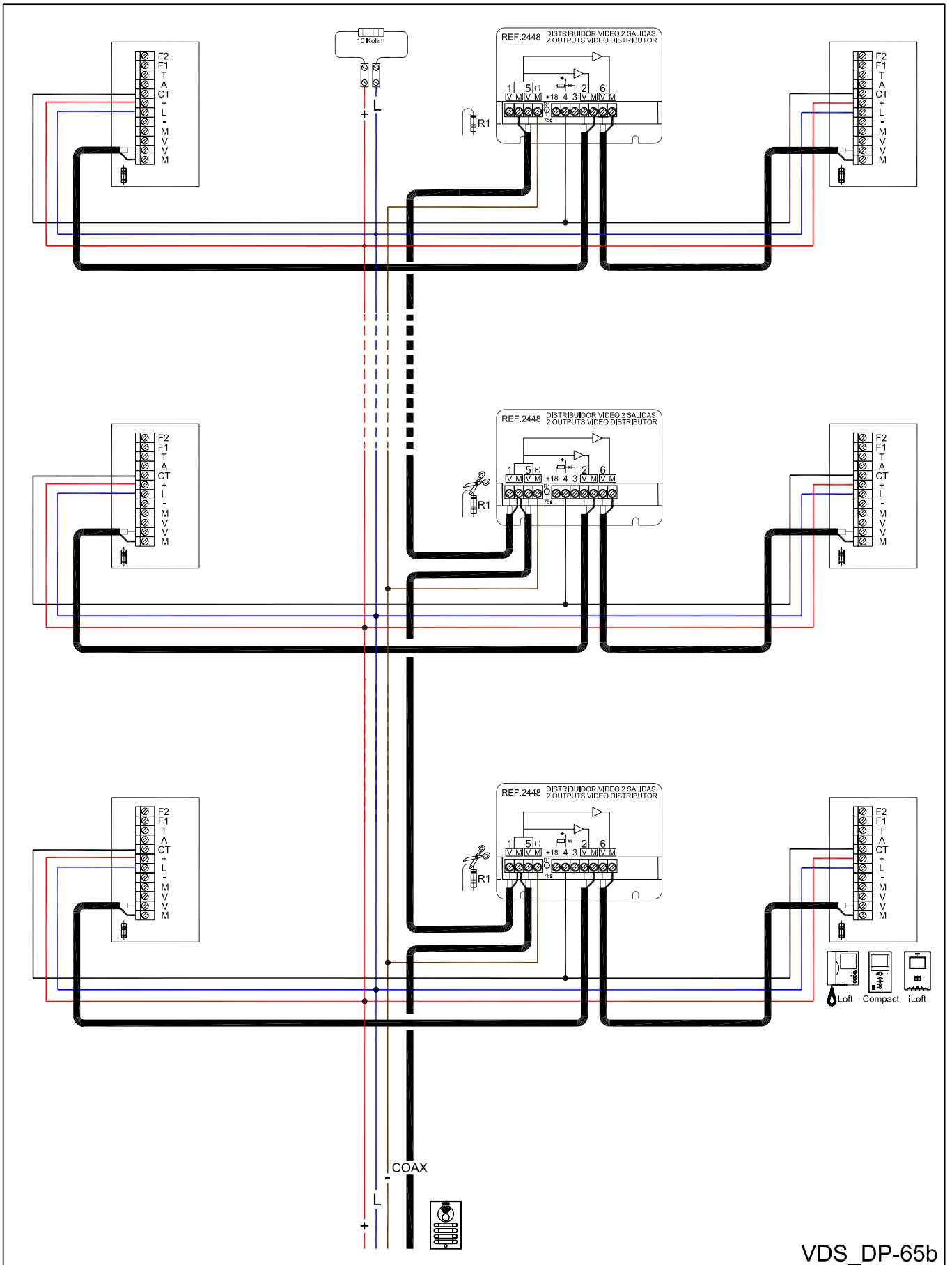
VDS_DP-64b

- E** Plantas de Video. En distribución.
- EN** Video distribution. In distribution.
- F** Distribution étages vidéo. En distribution.
- D** Videoetage. Mit Videoverteiler.



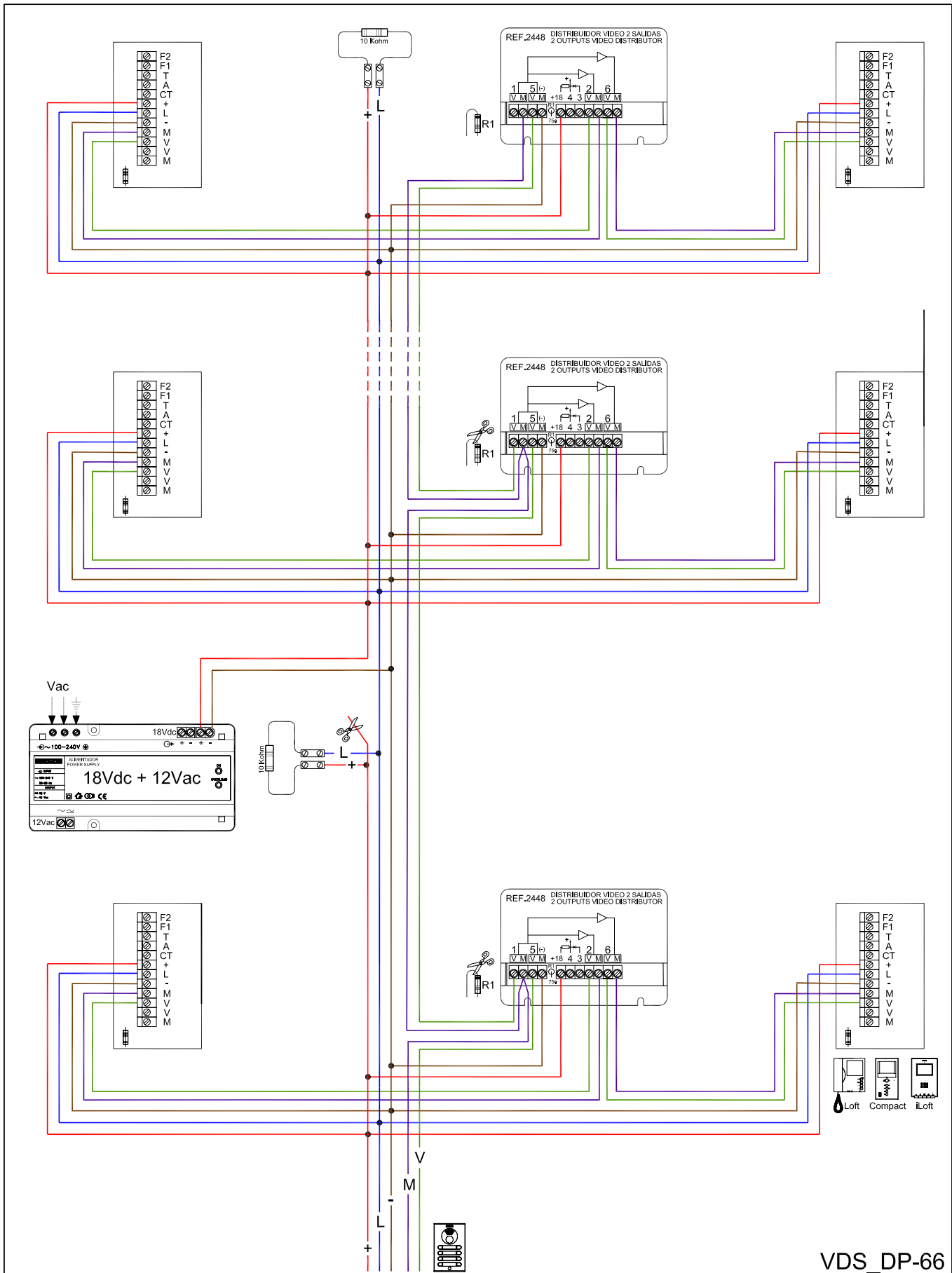
VDS_DP-65

- E** Plantas de Video. En distribución. (coaxial).
- EN** Video distribution. In cascade (coaxial).
- F** Distribution étages vidéo. En cascade (coaxial).
- D** Videoetage. Mit Videoverteiler (Koaxial).

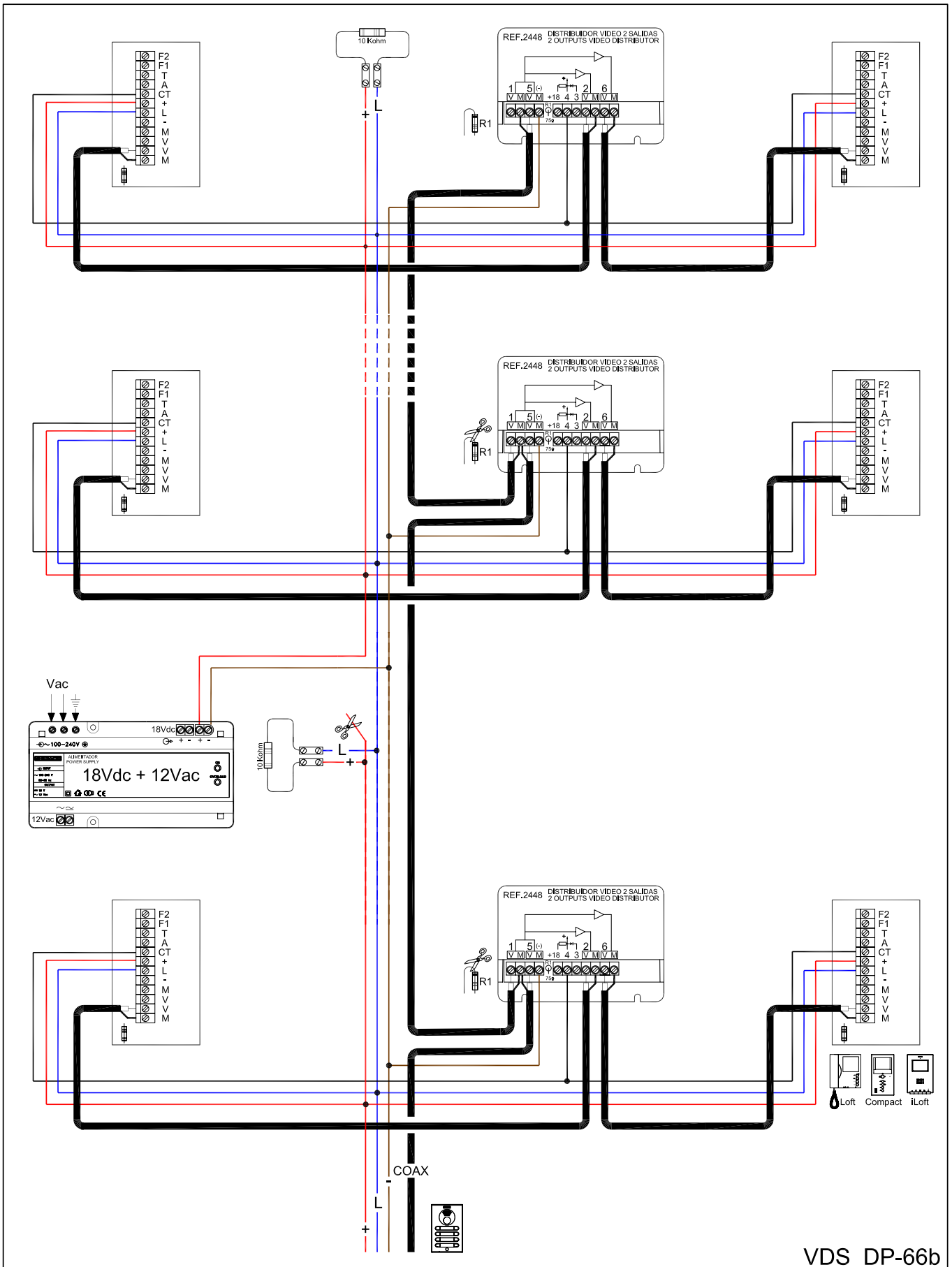


VDS_DP-65b

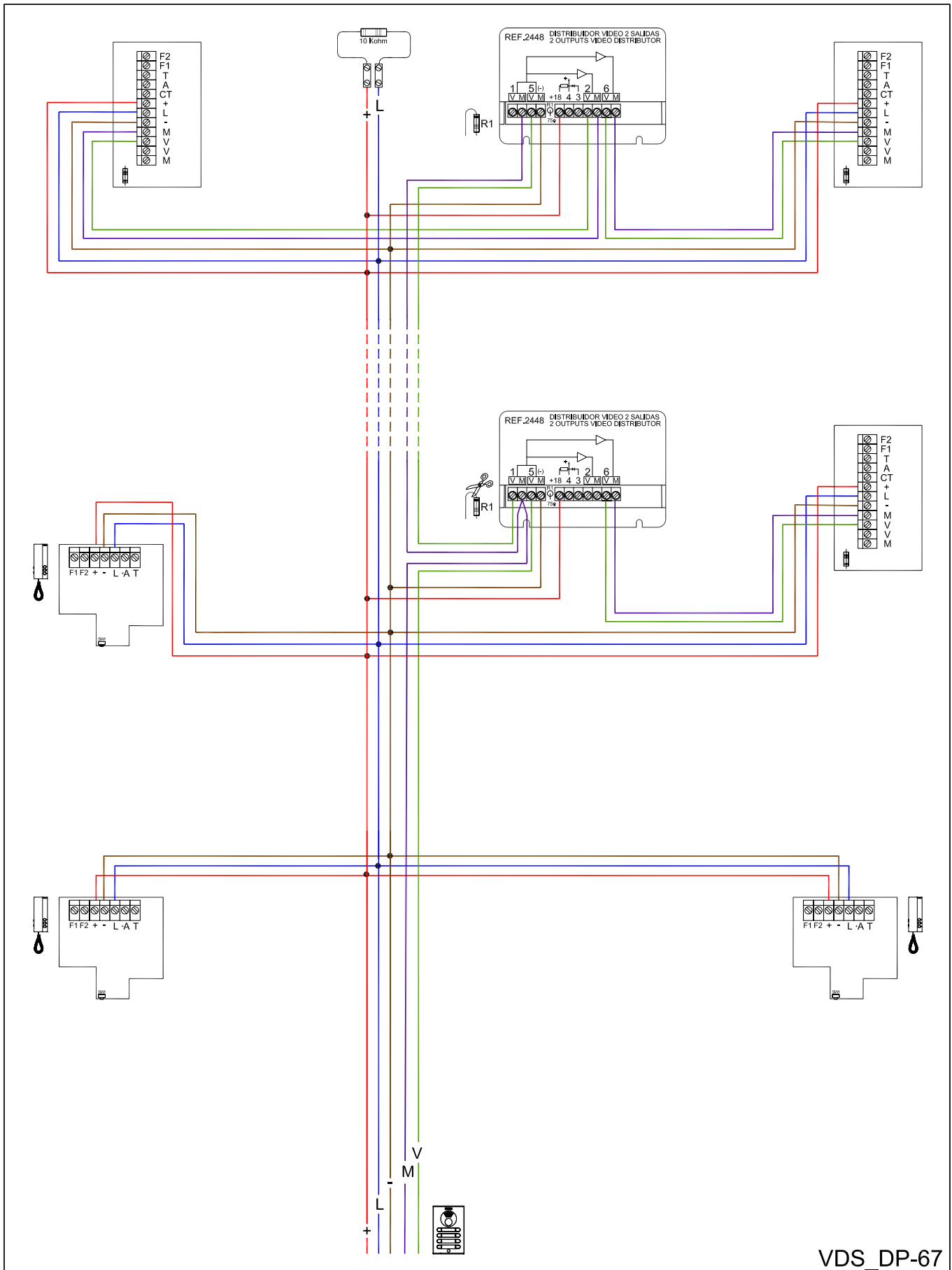
- Plantas de Video. En distribución. Alimentación adicional.
- Video distribution. In cascade. Additional Power Supply.
- Distribution étages vidéo. En cascade. Alimentation supplémentaire.
- Videoetage. Mit Videoverteiler. Zusatzstromversorgung.



- E** Plantas de Video. En distribución (coaxial). Alimentación adicional.
- EN** Video distribution. In cascade (coaxial). Additional Power Supply.
- F** Distribution étages vidéo. En cascade (coaxial). Alimentation supplémentaire.
- D** Videoteage. Mit Videoverteiler (Koaxial). Zusatzstromversorgung.

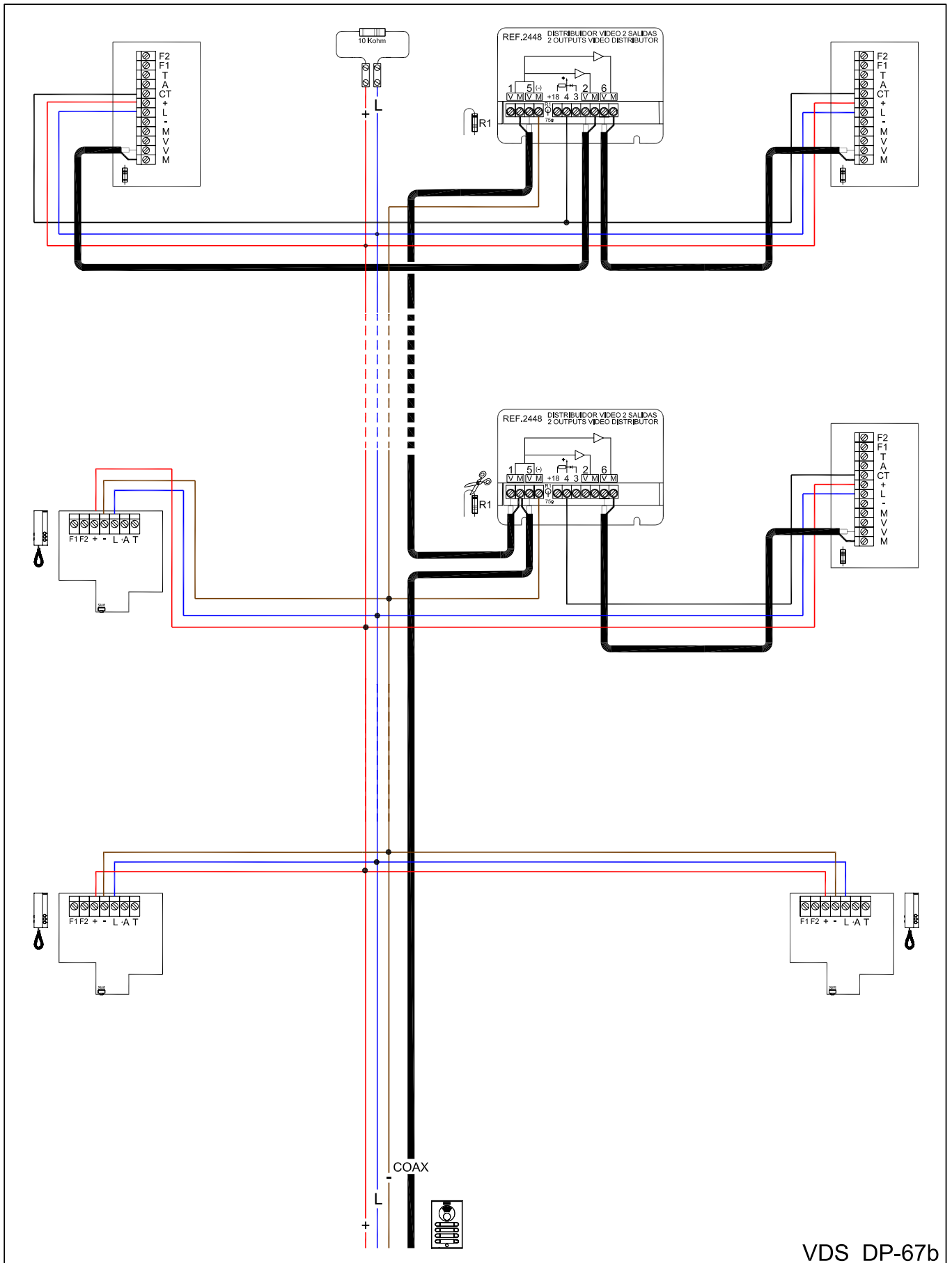


- E** Plantas de Audio + Video.
- EN** Audio + Video distribution.
- F** Distribution étages audio + vidéo.
- D** Stockwerkverteilung Audio + Video.



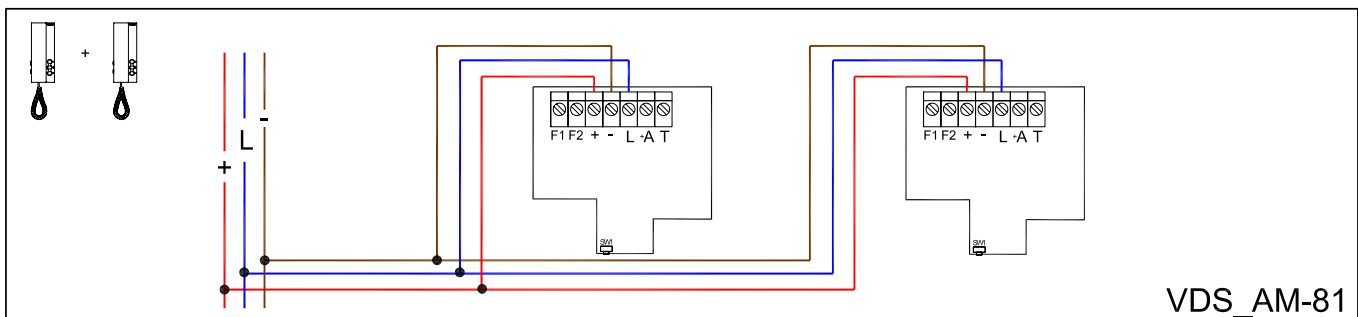
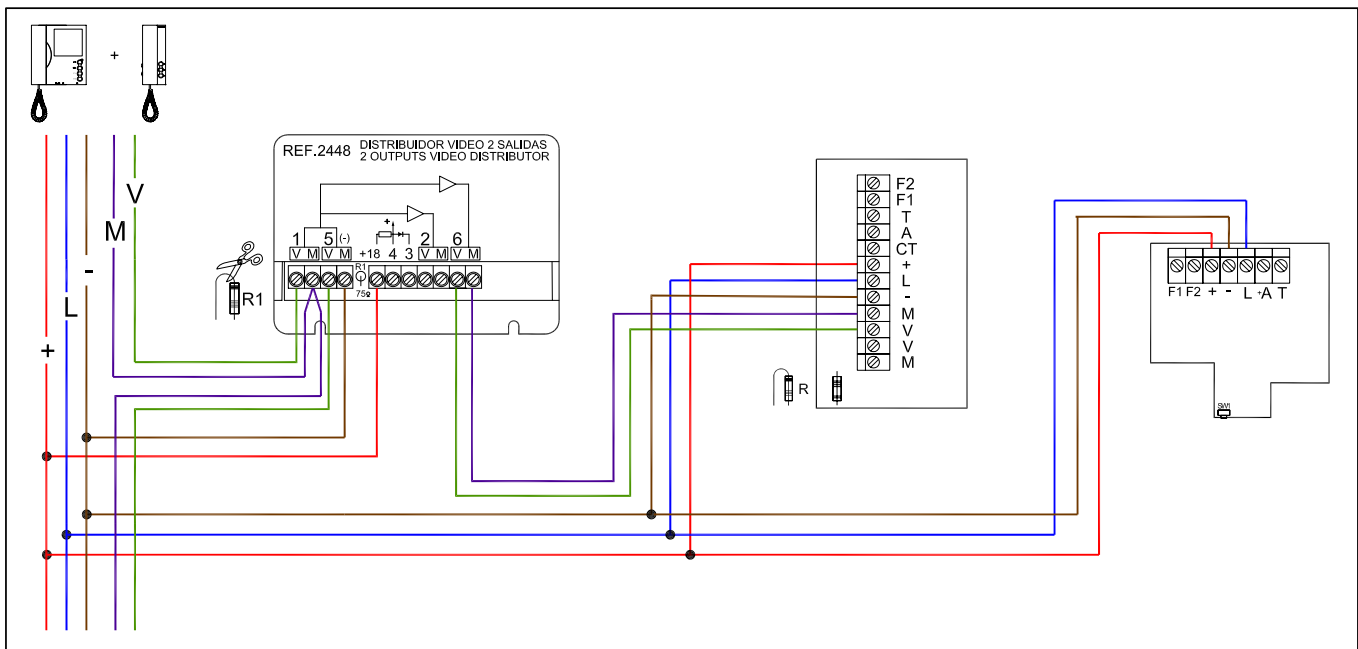
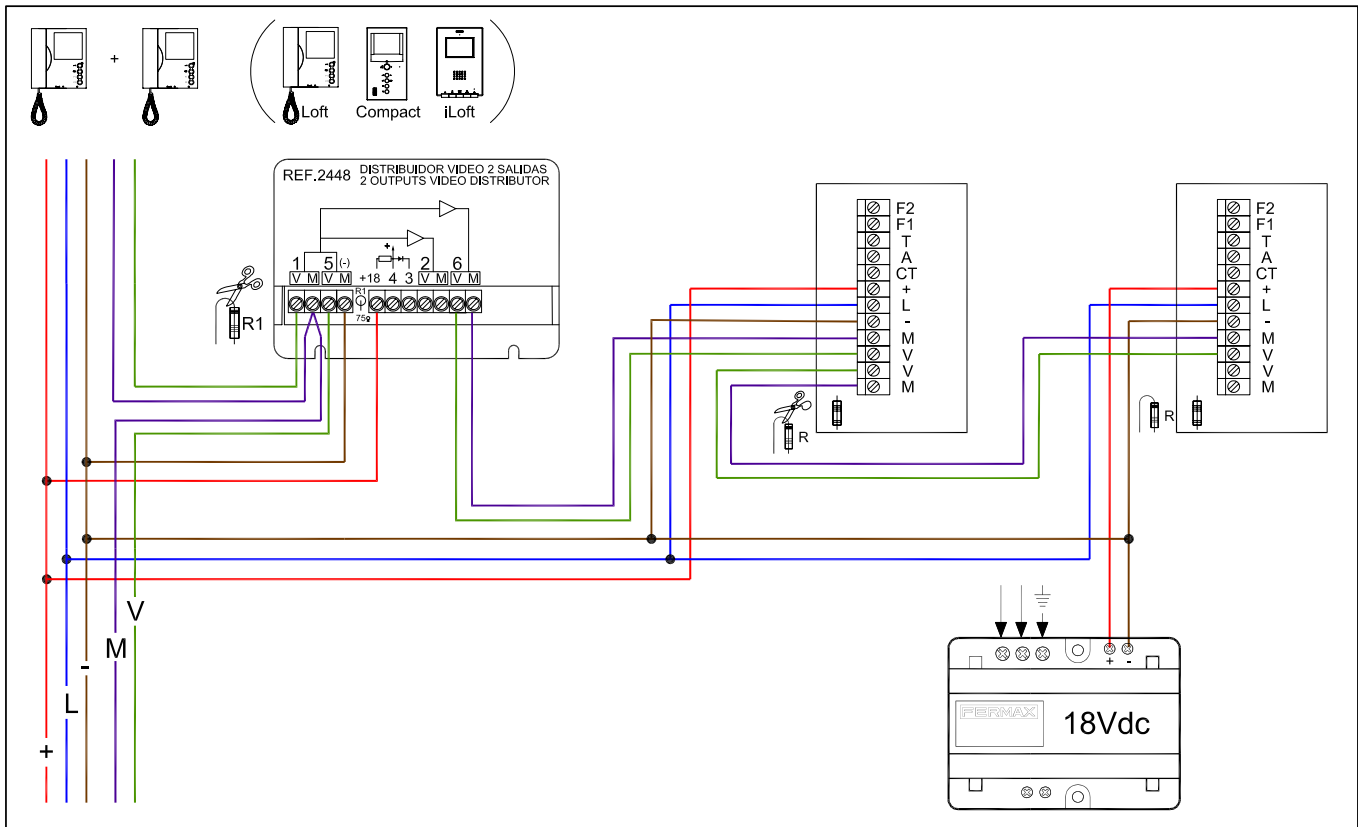
VDS_DP-67

- E** Plantas de Audio + Video.
- EN** Audio + Video distribution.
- F** Distribution étages audio + vidéo.
- D** Stockwerkverteilung Audio + Video.



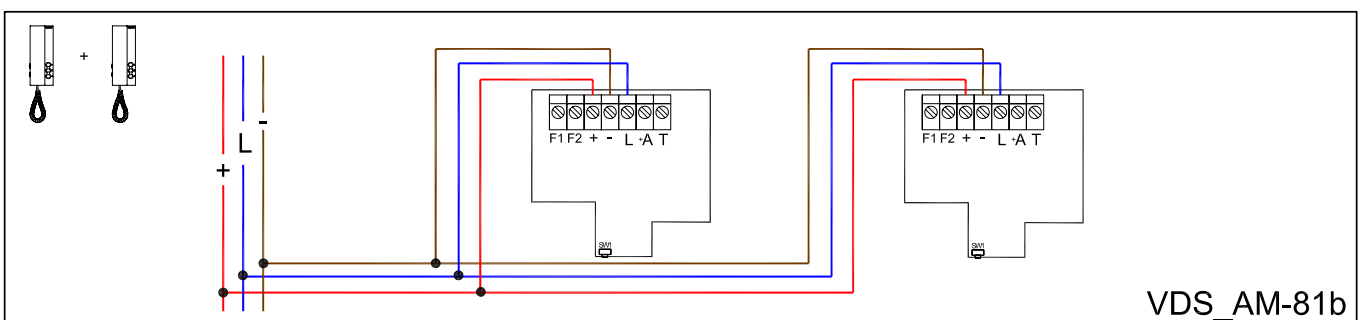
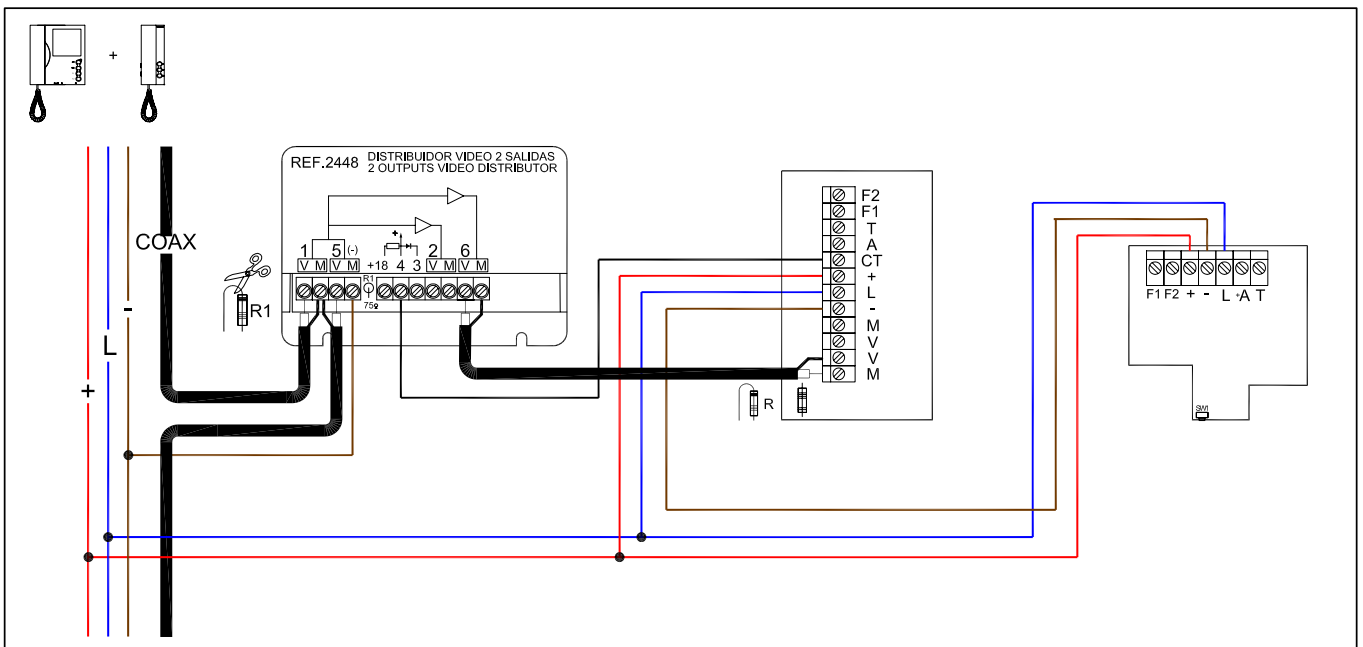
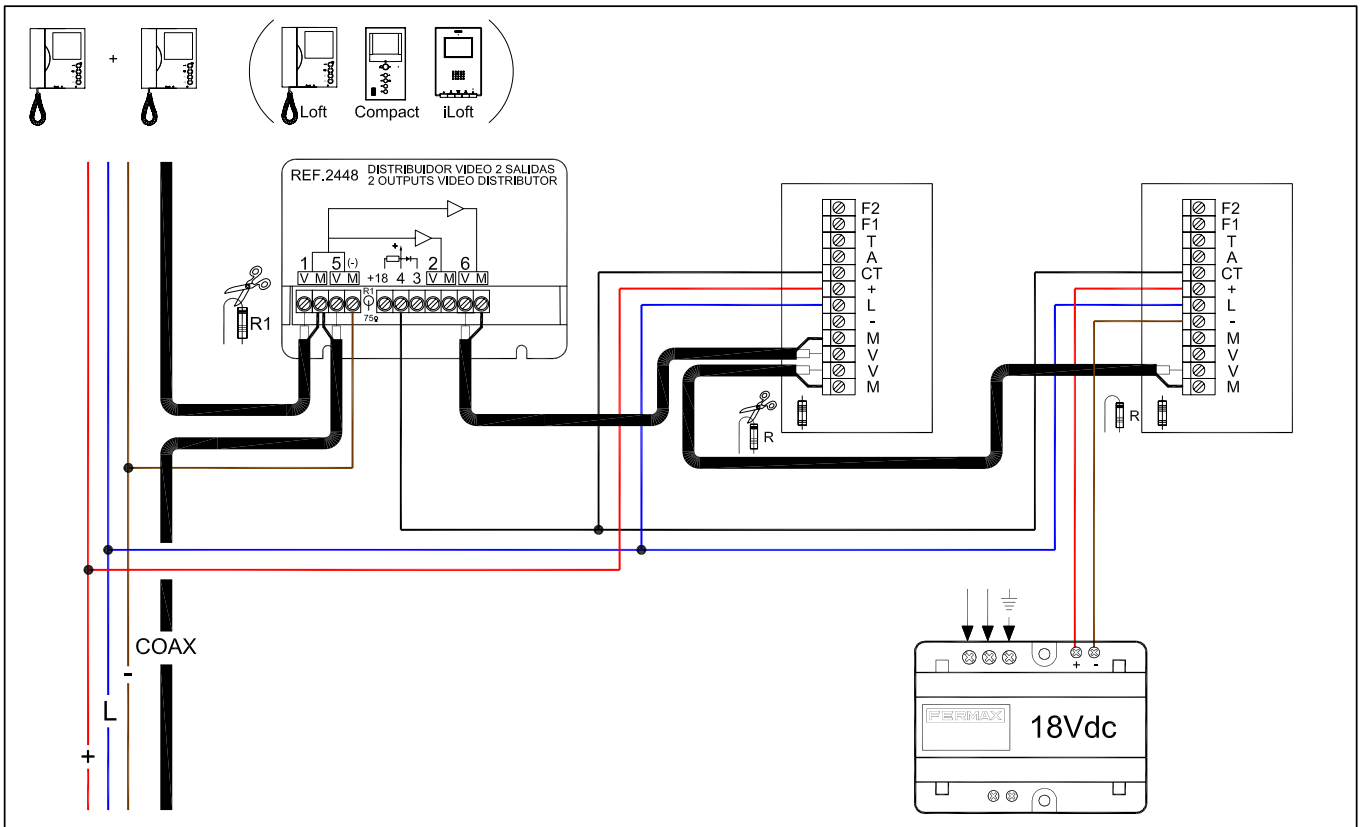
VDS_DP-67b

- Ampliaciones. Monitor y teléfono adicional.
- Extensions. Monitor and additional telephone.
- Extensions. Moniteurs et postes supplémentaires.
- Erweiterungen. Zusätzliche Monitor und Telefon.



VDS_AM-81

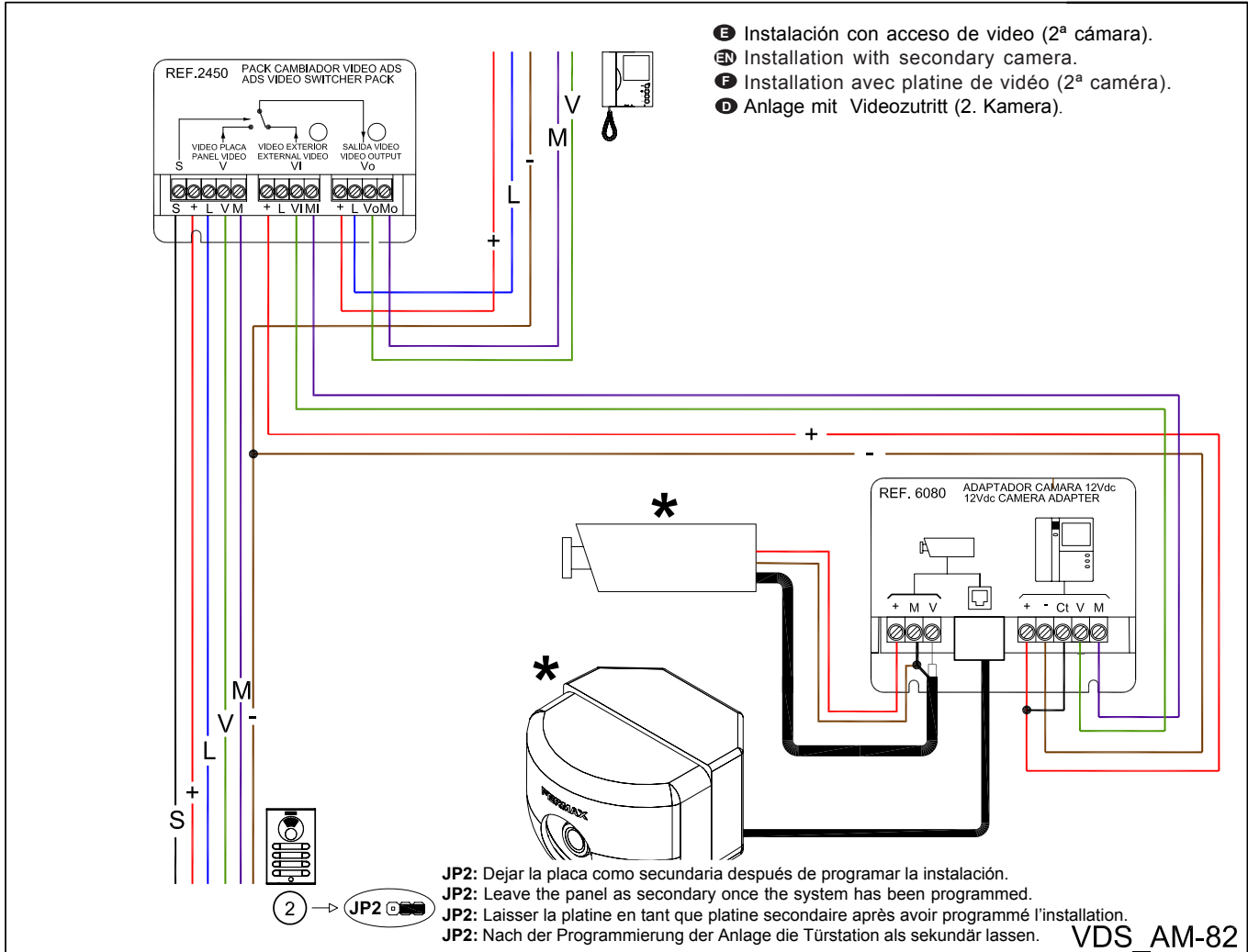
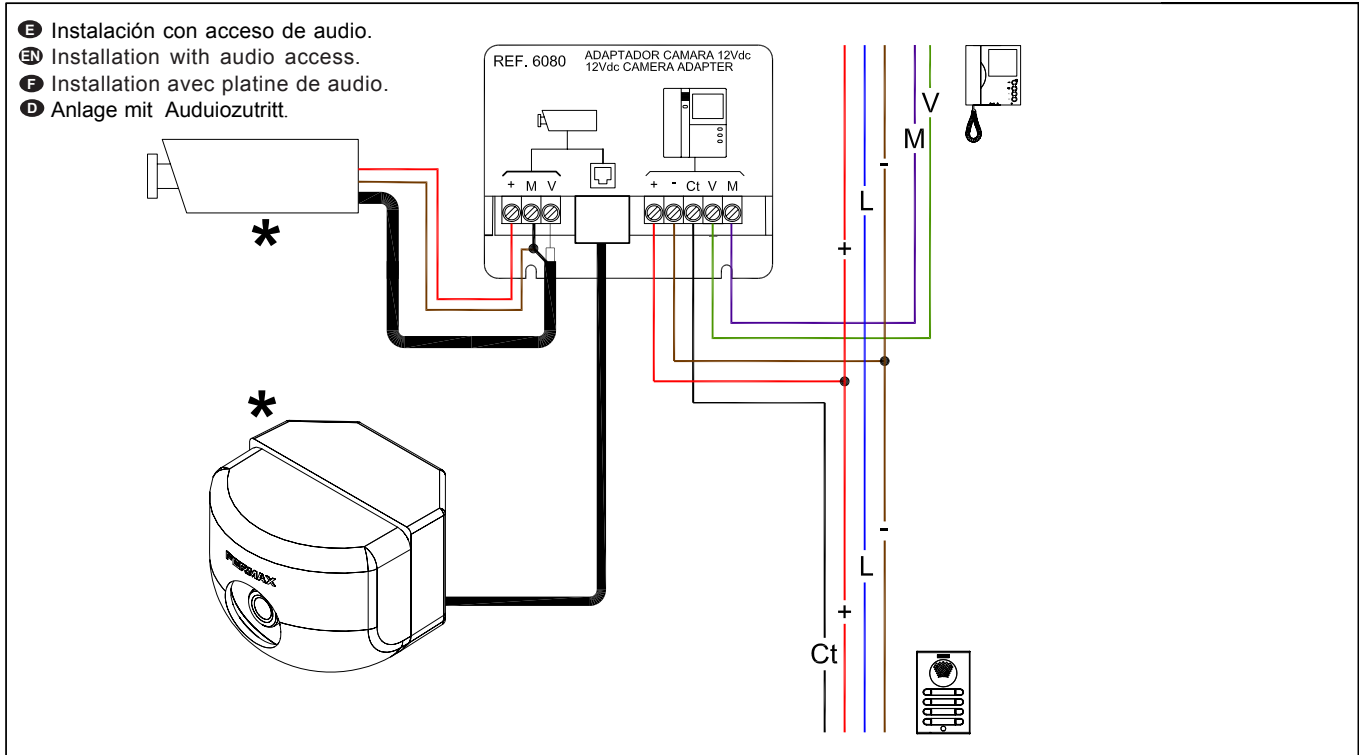
- E** Ampliaciones. Monitor y teléfono adicional (coaxial).
- EN** Extensions. Monitor and additional telephone (coaxial).
- F** Extensions. Moniteurs et postes supplémentaires (coaxial).
- D** Erweiterungen. Zusätzliche Monitor und Telefon (Koaxial).



VDS_AM-81b

- E** Accesorios. Cámara aérea.
- EN** Accessories. Arial Camera.
- F** Accessoires. Caméra aérienne
- D** Zubehöre. Zusatzkamera.

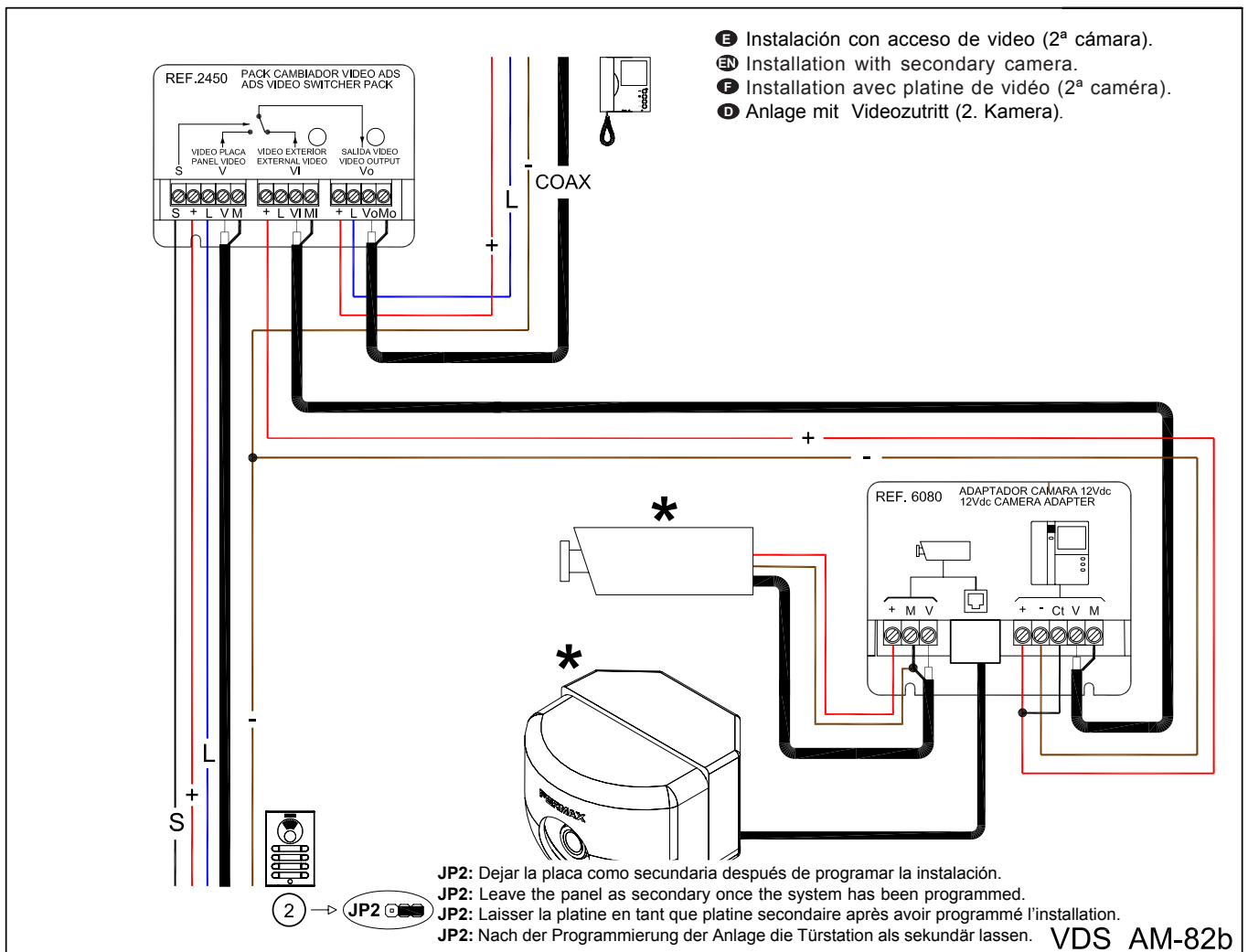
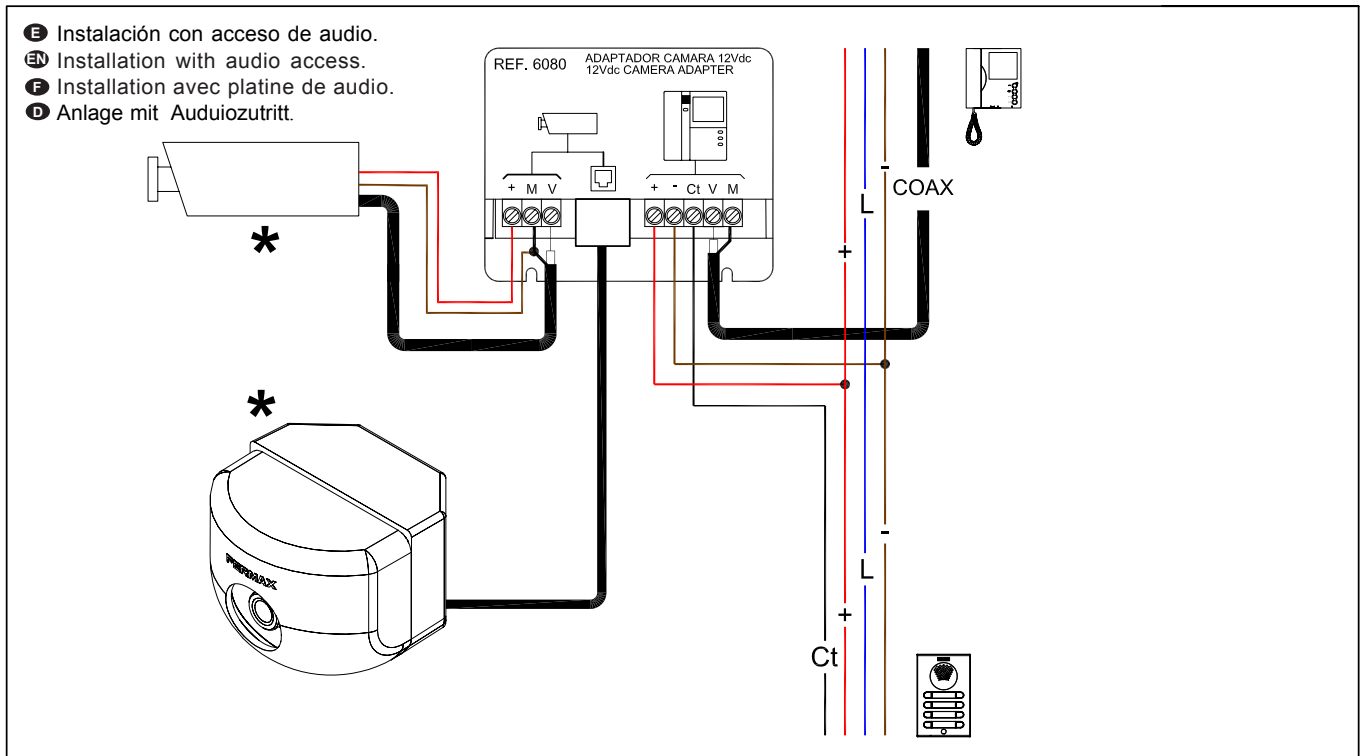
- ***
- E** * Conectar sólo 1 cámara
- EN** * Connect only 1 camera
- F** * Ne raccorder qu'une caméra
- D** * Nur 1 Kamera anschließen



VDS_AM-82

- E** Accesorios. Cámara aérea. (coaxial).
- EN** Accessories. Arial Camera. (coaxial).
- F** Accessoires. Caméra aérienne (coaxial).
- D** Zubehöre. Zusatzkamera (Koaxial).

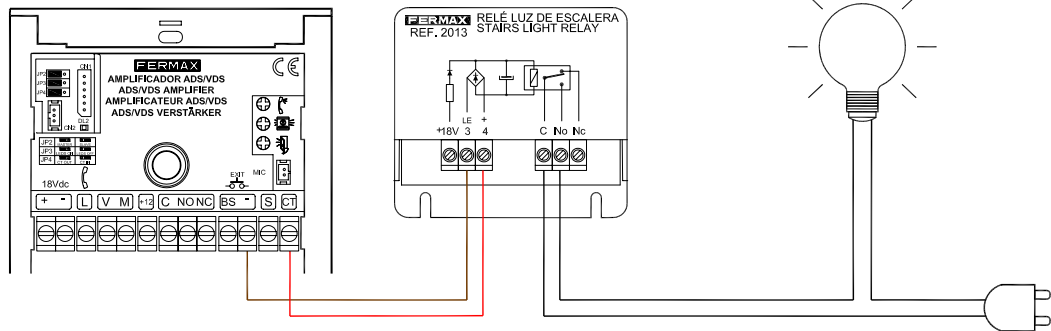
- ***
- E** * Conectar sólo 1 cámara
- EN** * Connect only 1 camera
- F** * Ne raccorder qu'une caméra
- D** * Nur 1 Kamera anschließen



VDS_AM-82b

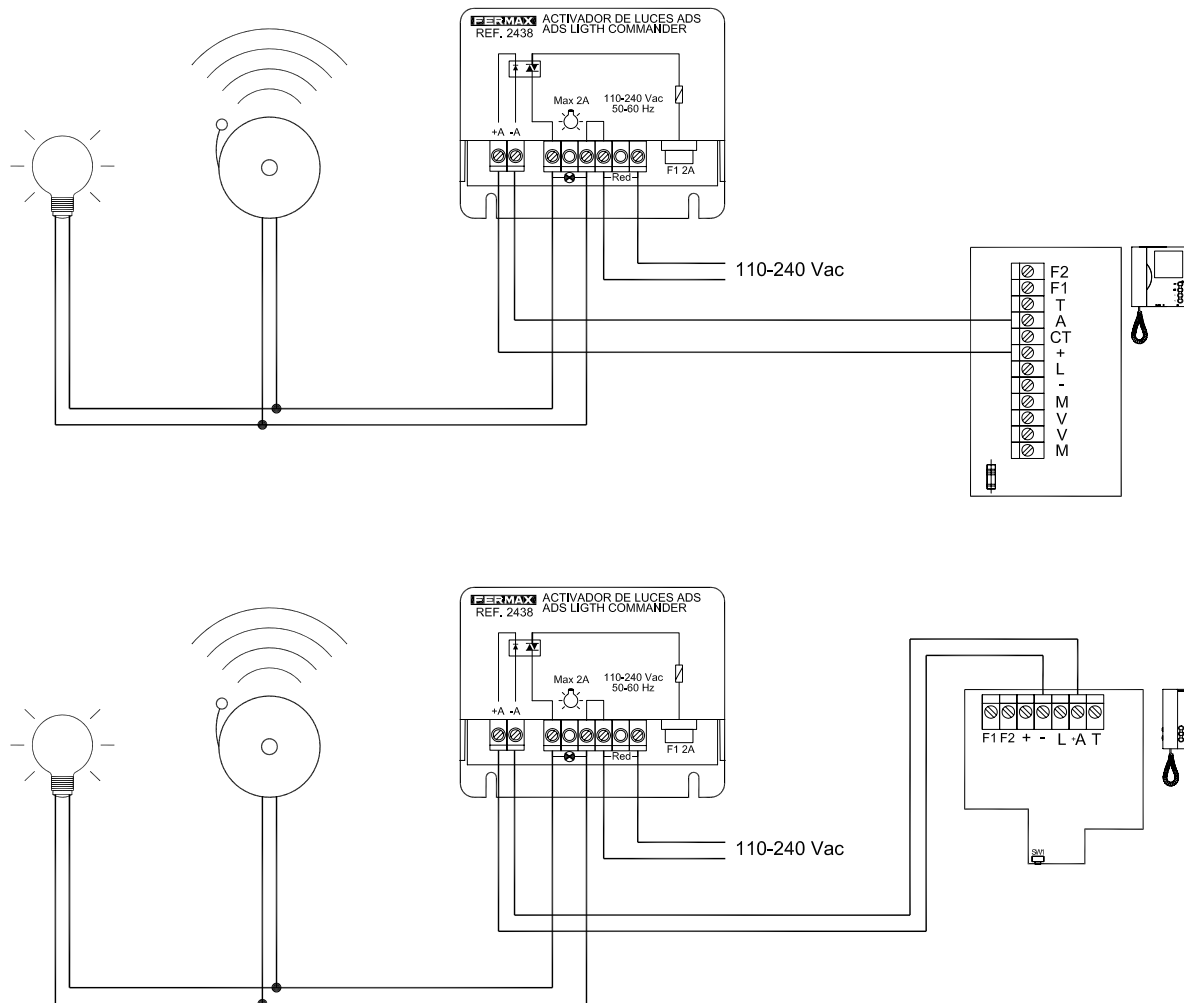
- E** Accesorios.
- EN** Accessories.
- F** Accessoires.
- D** Zubehör.

- E** Iluminación adicional en placa.
- EN** Additional lighting panel.
- F** Illumination supplémentaire platine.
- D** Zusatzbeleuchtung.



VDS_AM-83

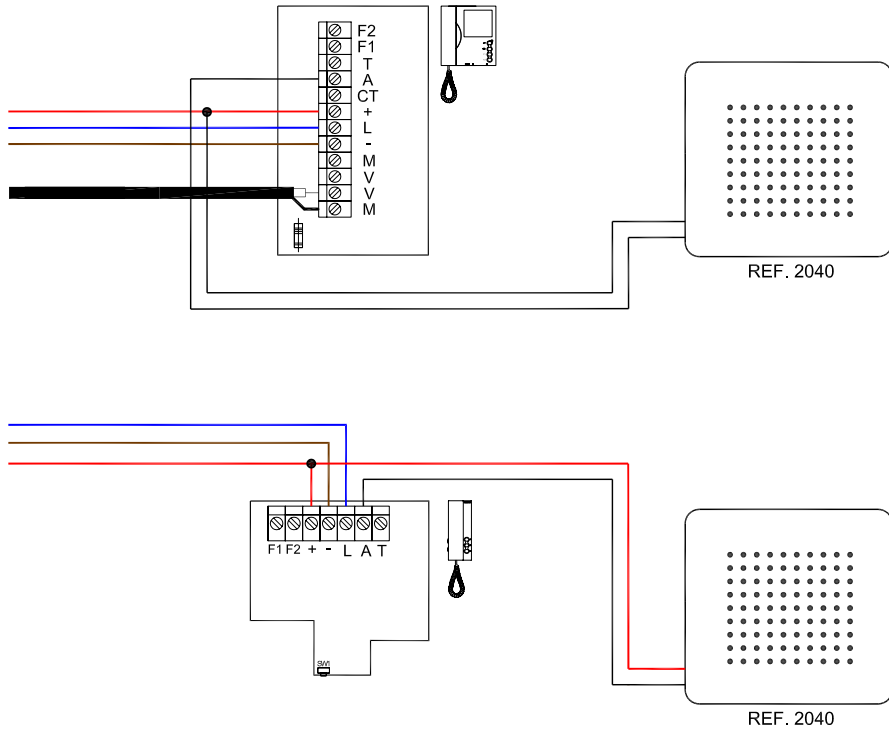
- E** Activador de luces y timbres por llamada.
- EN** Call Based Light commander.
- F** Activateur lumières par appel.
- D** Lichtaktivator durch Anruf.



VDS_AM-84

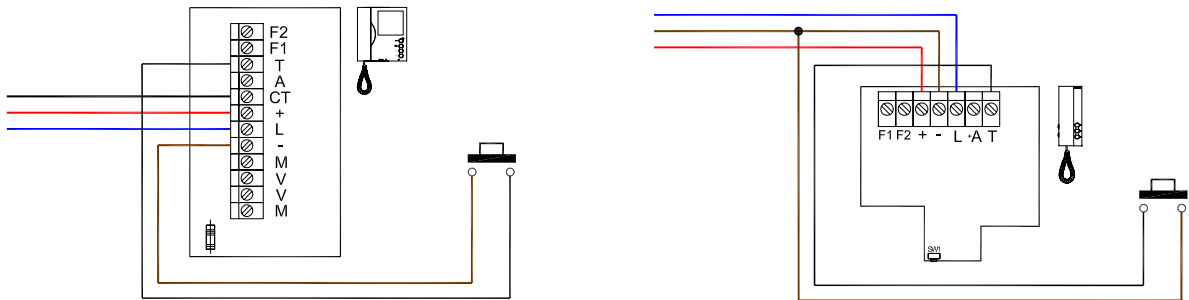
- E** Accesorios.
- EN** Accessories.
- F** Accessoires.
- D** Zubehöre.

- E** Prolongador de llamada.
- EN** Call extender.
- F** Sonnerie supplémentaire
- D** Anrufserweiterung



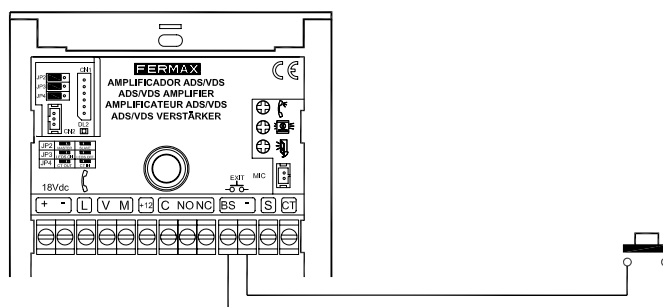
VDS_AM-85

- E** Pulsador adicional timbre puerta vivienda.
- EN** Additional push button for dwelling's door bell.
- F** Bouton-poussoir d'appel additionnel de la porte du logement.
- D** Zusätzliche Etagenruftaste



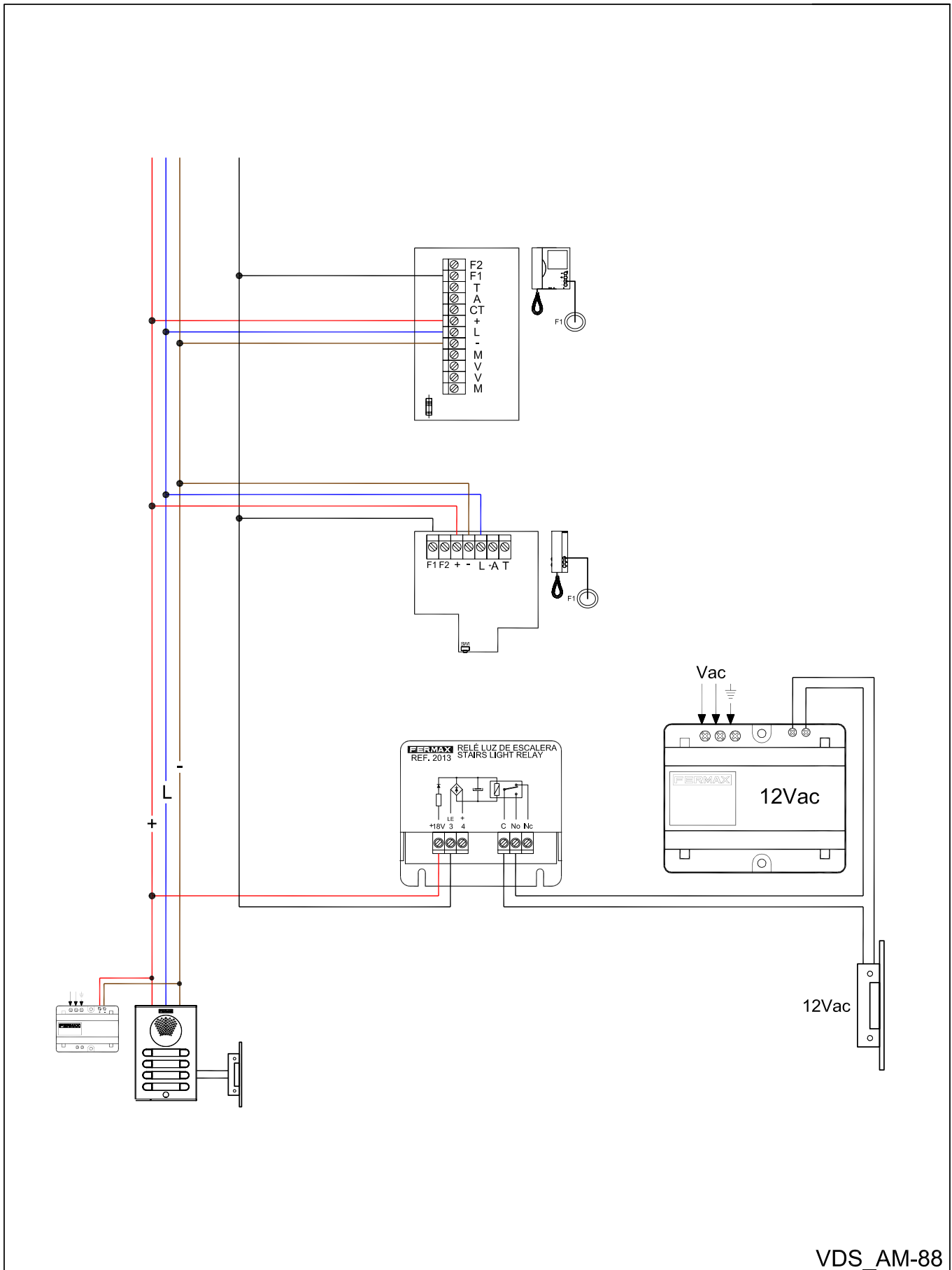
VDS_AM-86

- E** Pulsador de zaguán para apertura de puerta desde el interior.
- EN** Interior exit push button.
- F** Bouton-poussoir des portes depuis l'intérieur du hall.
- D** Türöffnungstaste von der Diele.



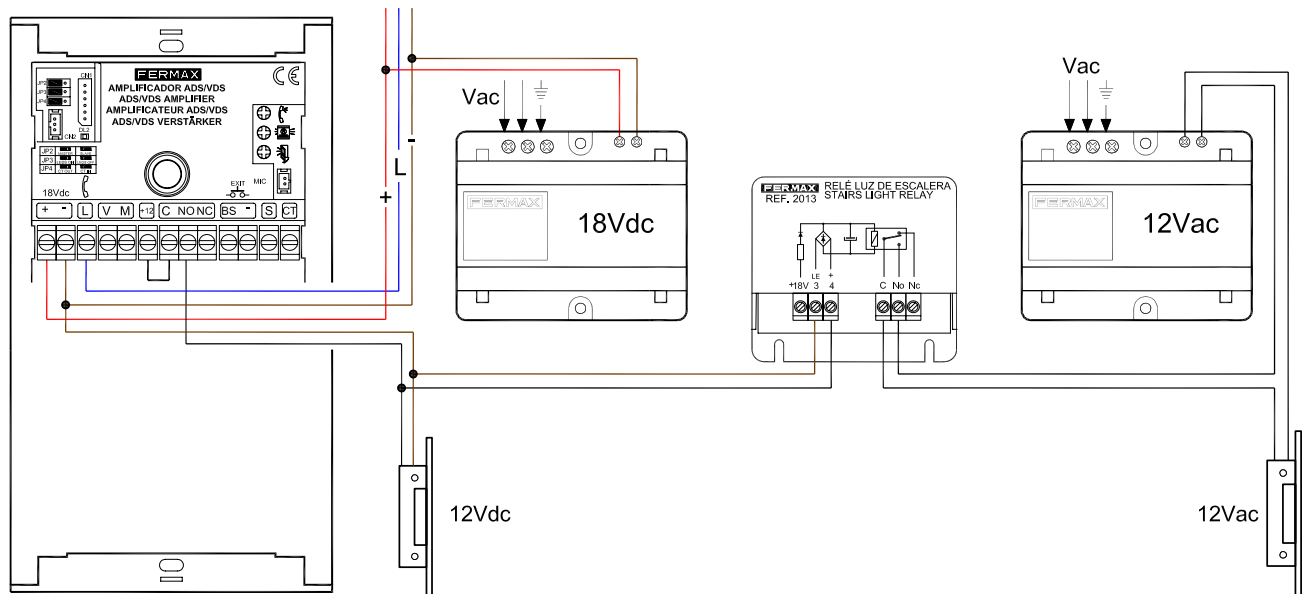
VDS_AM-87

- Ⓔ Accesorios. Apertura de 2ª puerta desde pulsador adicional del monitor/teléfono.
- Ⓔ Accessories. Secondary door opening push button from the monitor/telephone.
- Ⓔ Accessoires. Ouverture de la seconde porte grâce avec bouton-poussoir du moniteur/poste.
- Ⓔ Zubehör. Zusätzliche Taste vom Monitor/Telefon für Öffnung der zweiten Tür



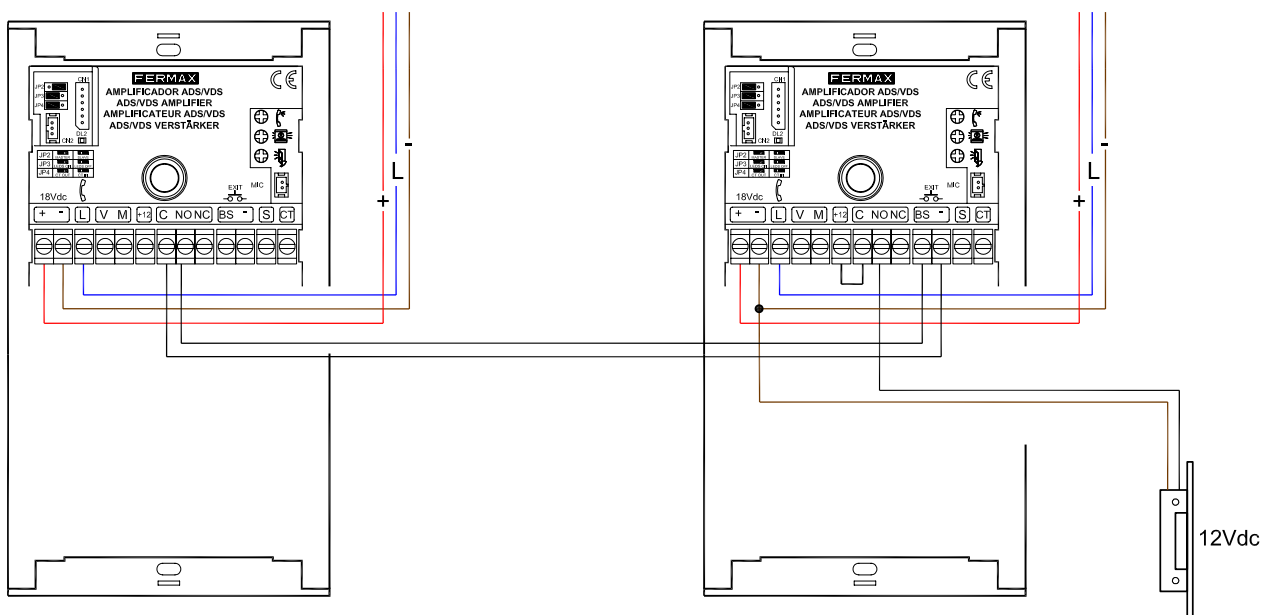
- E** Accesorios. Apertura de puerta.
- EN** Accessories. Door opening.
- F** Accessoires. Ouverture de la porte.
- D** Zubehöre. Zusätzliche Taste.

- E** Apertura simultánea de 2 puertas con abrepuertas de continua y de alterna.
- EN** Opening two doors simultaneously with AC and DC lock.
- F** Ouverture simultanée des deux portes avec gâche à courant alternatif et continu.
- D** Gelichzeitige Öffnung von 2 Türe mit Gleich- und Wechselstrom.



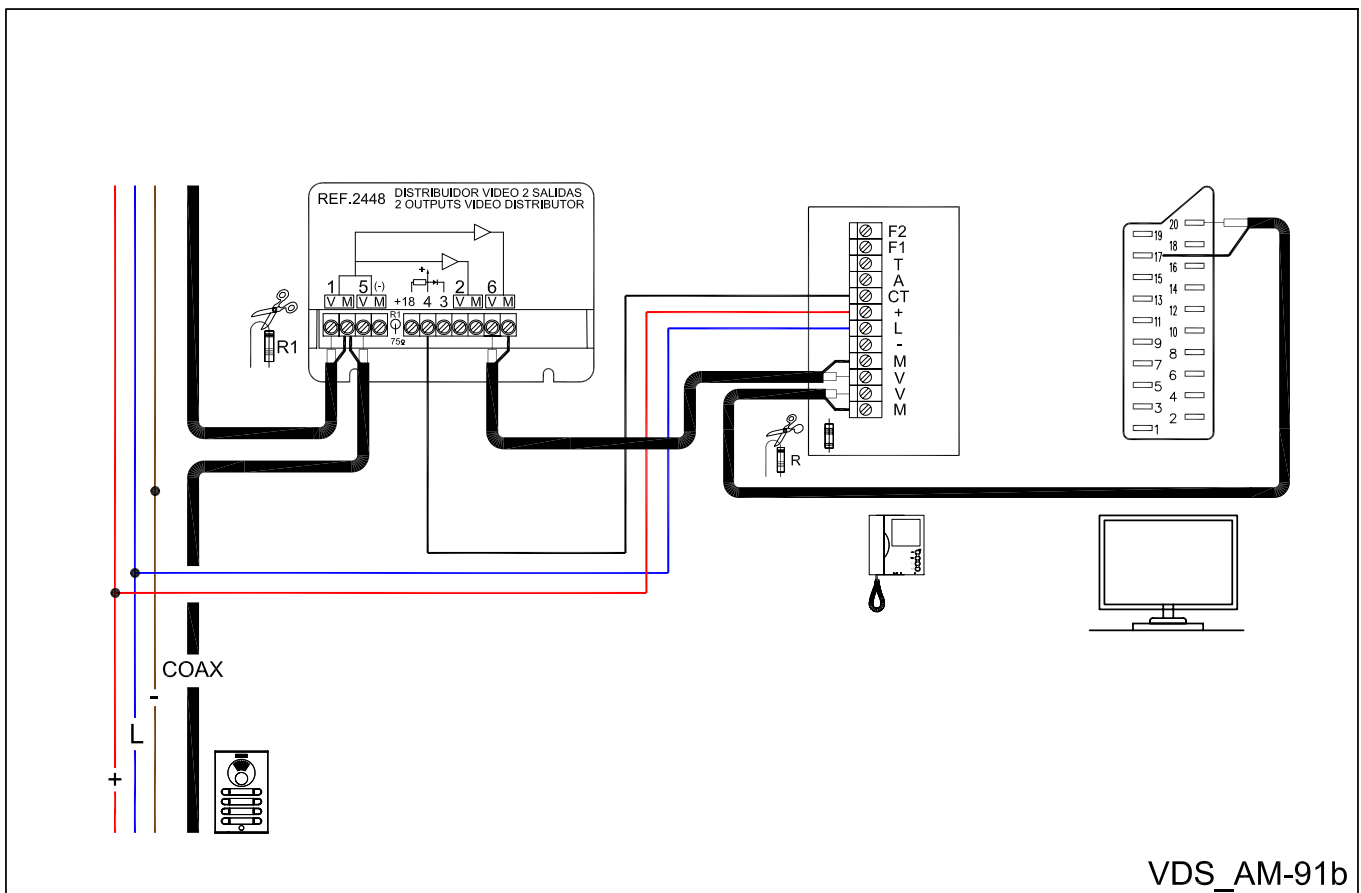
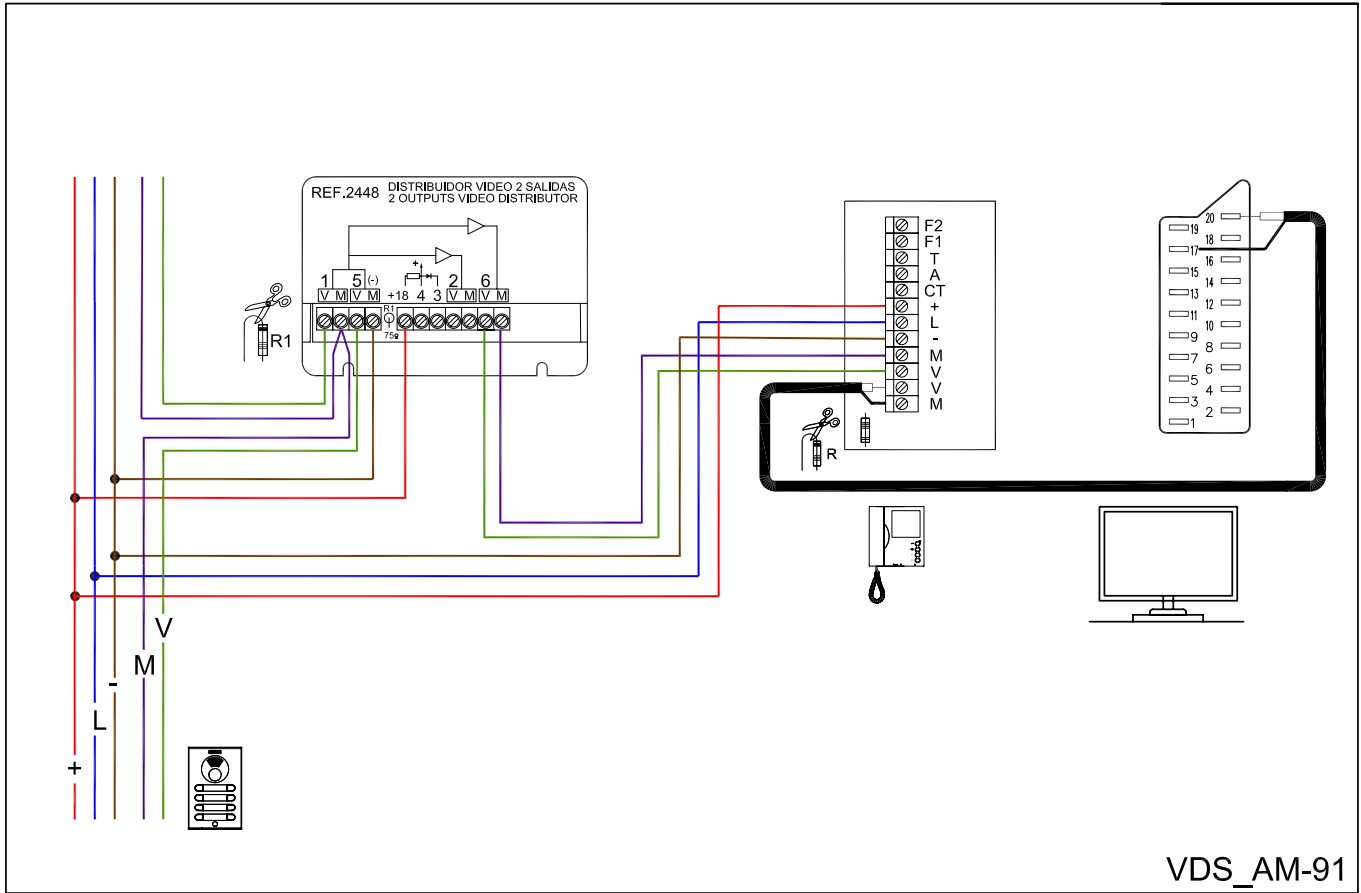
VDS_AM-89

- E** Abrepuertas compartido por dos placas.
- EN** Lock shared by two panels
- F** Gâche partagée par deux platines.
- D** Geteilte Türöffnung für 2 Türstationen.



VDS_AM-90

- Visualización de la imagen de videoportero en la TV (a través de euroconector).
- Watch the camera's image on TV (via Eurocart connector)
- Visualisation de l'image du vidéo-portier par la télé (à travers du euroconnecteur).
- Bild auf dem Fernseher (Mit Modulator)





Audio and Video Door Entry Systems
www.fermax.com | fermax@fermax.com