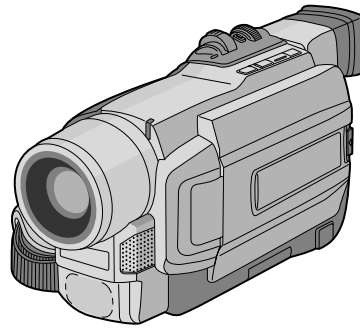


JVC

SERVICE MANUAL

DIGITAL VIDEO CAMERA

GR-DVL510A/A-S/EA, DVL910A/A-S/EA



Mini DV PAL
 DSC
 DIGITAL
 STILL CAMERA

Regarding service information other than these sections, refer to the GR-DVL557EG service manual (No. 86614). Also, be sure to note important safety precautions provided in the service manual.

SPECIFICATIONS *(The specifications shown pertain specifically to the model GR-DVL910A/DVL510A/DVL450A/DVL313A/DVL310A/DVL210A/DVL910EA/DVL510EA/DVL210EA)*

Camcorder		For Digital Still Camera (GR-DVL910A/DVL510A/DVL910EA/DVL510EA only)	
For General		Storage media : SD Memory Card/MultiMediaCard	
Power supply	: DC 11.0 V \equiv (Using AC Adapter) DC 7.2 V \equiv (Using battery pack)	Compression system	: JPEG (compatible)
Power consumption		File size	: VGA (640 x 480 pixels)
LCD monitor off, viewfinder on	: Approx. 4.3 W	Picture quality	: 2 modes (FINE/STANDARD)
LCD monitor on, viewfinder off	: Approx. 5.3 W	Approximate number of storable images with memory card [8 MB] (provided)	
Video light	: Approx. 3.5 W	FINE	: 100
Dimensions (W x H x D)	: 83 mm x 97 mm x 188 mm (with the LCD monitor closed and the viewfinder pushed down)	STANDARD	: 200
Weight	: Approx. 610 g (GR-DVL910A/DVL450A/DVL910EA) Approx. 590 g (GR-DVL510A/DVL313A/DVL310A/DVL210A/DVL510EA/DVL210EA)	with memory card [16 MB] (optional)	
Operating temperature	: 0°C to 40°C	FINE	: 200
Operating humidity	: 35% to 80%	STANDARD	: 400
Storage temperature	: -20°C to 50°C	with memory card [32 MB] (optional)	
Pickup	: 1/4" CCD	FINE	: 400
Lens	: F 1.8, f = 3.6 mm to 36 mm, 10:1 power zoom lens	STANDARD	: 800
Filter diameter	: ϕ 37 mm	with memory card [64 MB] (optional)	
LCD monitor	: 3.5" diagonally measured, LCD panel/TFT active matrix system (GR-DVL910A/DVL450A/DVL910EA) 2.5" diagonally measured, LCD panel/TFT active matrix system (GR-DVL510A/DVL313A/DVL310A/DVL210A/DVL510EA/DVL210EA)	FINE	: 800
Viewfinder	: Electronic viewfinder with 0.44" colour LCD (GR-DVL910A/DVL450A/DVL910EA) Electronic viewfinder with 0.24" black/white LCD (GR-DVL510A/DVL313A/DVL310A/DVL210A/DVL510EA/DVL210EA)	STANDARD	: 1600
Speaker	: Monaural	For Connectors	
For Digital Video Camera		S-Video	
Format	: DV format (SD mode)	Output	: Y : 1 V (p-p), 75 Ω , analogue C : 0.29 V (p-p), 75 Ω , analogue
Signal format	: PAL standard	Input (GR-DVL910A/DVL510A/DVL910EA/DVL510EA only)	: Y : 0.8 V (p-p) - 1.2 V (p-p), 75 Ω , analogue C : 0.2 V (p-p) - 0.4 V (p-p), 75 Ω , analogue
Recording/Playback format	: Video: Digital component recording Audio: PCM digital recording, 32 kHz 4-channel (12-bit), 48 kHz 2-channel (16-bit)	AV	
Cassette	: Mini DV cassette	Video output	: 1 V (p-p), 75 Ω , analogue
Tape speed	: SP: 18.8 mm/s LP: 12.5 mm/s	Video input (GR-DVL910A/DVL510A/DVL910EA/DVL510EA only)	: 0.8 V (p-p) - 1.2 V (p-p), 75 Ω , analogue
Maximum recording time (using 80 min. cassette)	: SP: 80 min. LP: 120 min.	Audio output	: 300 mV (rms), 1 k Ω , analogue, stereo
		Audio input (GR-DVL910A/DVL510A/DVL910EA/DVL510EA only)	: 300 mV (rms), 50 k Ω , analogue, stereo
		DV	
		Output	: 4-pin, IEEE 1394 compliant
		Input	: 4-pin, IEEE 1394 compliant
		USB (GR-DVL910A/DVL510A/DVL910EA/DVL510EA only)	: 5-pin
		PC (DIGITAL PHOTO)	
		(GR-DVL450A/DVL313A/DVL310A/DVL210A/DVL210EA only)	: ϕ 2.5 mm, 3-pole
		EDIT (GR-DVL910A/DVL510A/DVL910EA/DVL510EA only)	: ϕ 3.5 mm, 2-pole
		JLIP (GR-DVL450A/DVL313A/DVL310A/DVL210A/DVL210EA only)	: ϕ 3.5 mm, 4-pole
		AC Adapter AP-V10A or AP-V10EA	
		Power requirement	: AC 110 V to 240 V \sim , 50 Hz/60 Hz
		Output	: DC 11 V \equiv , 1 A
		Dimensions (W x H x D)	: 59 mm x 31 mm x 84 mm
		Weight	: Approx. 140 g (not including Power Cord)

Specifications shown are for SP mode unless otherwise indicated. E & O.E. Design and specifications subject to change without notice.

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5. PARTS LIST (5-1 to 5-2)

5.1 PACKING AND ACCESSORY ASSEMBLY <M1> 5-1

The following table indicate main different points between models GR-DVL557EG, GR-DVL510A, GR-DVL510A-S, GR-DVL510EA, GR-DVL910A, GR-DVL910A-S and GR-DVL910EA.

ITEM	MODEL	GR-DVL557EG	GR-DVL510A	GR-DVL510A-S	GR-DVL510EA	GR-DVL910A	GR-DVL910A-S	GR-DVL910EA
VIEW FINDER	COLOR	B/W	←	←	COLOR	←	←	
LCD MONITOR	3.5"	2.5"	←	←	3.5"	←	←	
DIGITAL ZOOM	4X/30X	4X/50X	←	←	←	←	←	
ACRYLIC PANEL	Used	Not used	←	←	Used	←	←	
TOTAL ZOOM RATION	300X	500X	←	←	←	←	←	
AC ADAPTER	AP-V10EG	AP-V10A	AP-V10A-S	AP-V10EA	AP-V10A	AP-V10A-S	AP-V10EA	
REMOTE CONTROL	RM-V716U	RM-V717U	←	←	←	←	←	

The following table indicate different parts number between models GR-DVL557EG, GR-DVL510A, GR-DVL510A-S, GR-DVL510EA, GR-DVL910A, GR-DVL910A-S and GR-DVL910EA.

PACKING AND ACCESSORY ASSEMBLY <M1> Note: As for IB (INSTRUCTIONS), refer to sec.5.

REF. No.	ITEM	MODEL	GR-DVL557EG	GR-DVL510A	GR-DVL510A-S	GR-DVL510EA	GR-DVL910A	GR-DVL910A-S	GR-DVL910EA
1	PACKING CASE		LY32095-005A	LY32095-020B	←	LY32095-009A	LY32095-022B	←	LY32095-005A
4	POLY BAG		QPA02003006	QPA02003506	←	QPA02003006	QPA02003506	←	QPA02003006
9	WARRANTY CARD		BT-54013-2	—	—	BT-56001-2	—	—	BT-56001-2
10	SER.NET CARD		—	—	—	BT-56002-2	—	—	BT-56002-2
△ 12	AC ADAPTER		LY20688-013A	LY20688-003A	LY20688-014A	LY20688-007A	LY20688-003A	LY20688-014A	LY20688-007A
△ 25	POWER CORD		QMPL120-190-JR	QMPL020-190-JR	QMPS110-190-JR	QMPH020-190-JR	QMPL120-190-JR	QMPS110-190-JR	QMPH020-190-JR
26	ADAPTER PLUG		QAM0302-001	—	—	—	—	—	—
27	SHEET(CON.PLUG)		—	LYT0609-001A	←	—	LYT0609-001A	LYT0609-001A	—
△ 28	CONVERSION PLUG		—	PEMC1012-02	PEMC1012	—	PEMC1012-02	PEMC1012	—
30	CORE FILTER		—	*QQR0918-002	*←	*←	*←	*←	*←
31	CORE FILTER		—	*QQR0491-002	*←	*←	*←	*←	*←
32	CORE FILTER		—	*QQR0918-002	*←	*←	*←	*←	*←

FINAL ASSEMBLY <M2>

REF. No.	ITEM	MODEL	GR-DVL557EG	GR-DVL510A	GR-DVL510A-S	GR-DVL510EA	GR-DVL910A	GR-DVL910A-S	GR-DVL910EA
101	LOWER CASE ASSY		LY20706-003C	LY20706-002C	←	←	←	←	←
107	COVER(AJUST)		LY32092-013A	LY32092-023A	←	LY32092-010A	LY32092-027A	←	←
115	UPPER CASE ASSY		LY20717-004B	LY20707-010B	←	LY20707-010A	LY20717-008B	←	←
△ 130	FRONT COVER ASSY		LY20711-003A	LY20711-006A	←	←	←	←	←
130A	HOOD		LY32111-002A	LY32111-005A	←	←	←	←	←
136	STICKER(TOP)		LY43093-007A	LY43093-001A	←	←	←	←	←
160	SPECIAL SCREW		LY30018-006B	*LY30018-047A	*←	LY30018-006B	*LY30018-047A	*←	LY30018-006B

ELECTRONIC VIEWFINDER ASSEMBLY <M4>

REF. No.	ITEM	MODEL	GR-DVL557EG	GR-DVL510A	GR-DVL510A-S	GR-DVL510EA	GR-DVL910A	GR-DVL910A-S	GR-DVL910EA
300	VF ASSY		LY20712-002B	LY20744-002B	←	←	LY20712-004A	←	←
301	EYE PIECE ASSY		PTY20712-001	PTY20744-001	←	←	PTY20712-001	←	←
306	LCD ASSY		PTY20712-041	PTY20744-042	←	←	PTY20712-041	←	←
307	FPC		QAL0287-001	QAL0288-001	←	←	QAL0287-001	←	←
311	SCREW		PTY20712-051	PTY20744-051	←	←	PTY20712-051	←	←
313	LABEL/COLOR		LY40074-001A	—	—	—	LY40074-001A	←	←
314	LABEL(VF)		LY43041-002A	—	—	—	—	—	—

Notes : Mark ← is same as left.
 Mark — is not used.
 Mark * reference model was also changed.

MONITOR ASSEMBLY <M5>

REF. No.	ITEM	MODEL	GR-DVL557EG	GR-DVL510A	GR-DVL510A-S	GR-DVL510EA	GR-DVL910A	GR-DVL910A-S	GR-DVL910EA
△ 500	MONITOR ASSY	LYH20246-011A	LYH20246-011A	LYH20246-010A	←	←	LYH20246-024A	LYH20246-005A	←
501	MONITOR COVER ASSY	LY20721-002B	LY20721-002B	LY20702-003B	←	←	LY20721-002B	←	←
501H	WINDOW	LY32121-002B	LY32121-002B	LY32087-002B	←	←	LY32121-002B	←	←
501J	EARTH MON	LY42386-001A	—	—	—	—	LY42386-001A	←	←
501K	EL(WINDOW)	LY42193-001A	—	—	—	—	LY42193-001A	←	←
502	MONITOR CASE ASSY	LY20598-002A	LY10264-001A	—	←	←	LY20598-002A	←	←
502A	EARTH MON(2)	LY42388-001A	—	—	—	—	LY42388-001A	←	←
503	HOLDER	LY20568-001A	LY20674-001A	—	←	←	LY20568-001A	←	←
508	BACK LIGHT	QLL0081-001	QLL0093-001	—	←	←	QLL0081-001	←	←
509	LCD MODULE	QLD0096-002	QLD0154-001	—	←	←	QLD0096-002	←	←
517	SPACER(A)	LY30029-0A5A	—	—	—	—	LY30029-0A5A	←	←
518	#500SPACER0.01	PU59915-105	—	—	—	—	*LY30029-0Q6A	*←	*←

MAIN BOARD ASSEMBLY <01>

REF. No.	ITEM	MODEL	GR-DVL557EG	GR-DVL510A	GR-DVL510A-S	GR-DVL510EA	GR-DVL910A	GR-DVL910A-S	GR-DVL910EA
PW1	MAIN BOARD ASSY	YB10317PA-05	←	←	←	←	←	←	←
IC1403	IC	—	—	—	SN74AHC2G53T	—	—	—	SN74AHC2G53T
R1410	MG RESISTOR	—	—	—	NRSA6AJ-331W	—	—	—	NRSA6AJ-331W
R1411	MG RESISTOR	—	—	—	NRSA6AJ-473W	—	—	—	NRSA6AJ-473W
R1412	MG RESISTOR	—	—	—	NRSA6AJ-331W	—	—	—	NRSA6AJ-331W
R1413	MG RESISTOR	NRSA6AJ-331W	←	←	—	NRSA6AJ-331W	←	←	—
R6014	MG RESISTOR	NRSA63J-0R0X	←	←	—	NRSA63J-0R0X	←	←	—
S6001	SLIDE SWITCH	—	—	—	NSW0096-001X	—	—	—	NSW0096-001X

MONITOR BOARD ASSEMBLY <02>

REF. No.	ITEM	MODEL	GR-DVL557EG	GR-DVL510A	GR-DVL510A-S	GR-DVL510EA	GR-DVL910A	GR-DVL910A-S	GR-DVL910EA
Q7101	TRANSISTOR	—	2SA1774/QR/-X	←	←	—	—	—	—
Q7605	TRANSISTOR	DTA144EE	—	—	—	DTA144EE	←	←	←
Q7606	TRANSISTOR	DTC144EE	—	—	—	DTC144EE	←	←	←
Q7607	PAIR TRANSISTOTR	UMZ1N	—	—	—	UMZ1N	←	←	←
R7101	MG RESISTOR	—	NRSA63J-562X	←	←	—	—	—	—
R7102	MG RESISTOR	—	NRSA63J-562X	←	←	—	—	—	—
R7103	MG RESISTOR	—	NRSA63J-103X	←	←	—	—	—	—
R7110	MG RESISTOR	—	NRSA63J-0R0X	←	←	—	—	—	—
R7111	MG RESISTOR	—	NRSA63J-0R0X	←	←	—	—	—	—
R7112	MG RESISTOR	—	NRSA63J-0R0X	←	←	—	—	—	—
R7113	MG RESISTOR	—	NRSA63J-0R0X	←	←	—	—	—	—
R7114	MG RESISTOR	—	NRSA63J-0R0X	←	←	—	—	—	—
R7115	MG RESISTOR	—	NRSA63J-0R0X	←	←	—	—	—	—
R7612	CMF RESISTOR	NRVA63D-682X	NRVA63D-223X	←	←	NRVA63D-682X	←	←	←
R7621	MG RESISTOR	—	NRSA63J-0R0X	←	←	—	—	—	—
R7622	MG RESISTOR	NRSA63J-223X	—	—	—	NRSA63J-223X	←	←	←
R7623	MG RESISTOR	NRSA63J-223X	—	—	—	NRSA63J-223X	←	←	←
R7624	CMF RESISTOR	NRVA63D-223X	—	—	—	NRVA63D-223X	←	←	←
R7625	CMF RESISTOR	NRVA63D-223X	—	—	—	NRVA63D-223X	←	←	←
R7626	CMF RESISTOR	NRVA63D-183X	—	—	—	NRVA63D-183X	←	←	←
R7627	CMF RESISTOR	NRVA63D-334X	—	—	—	NRVA63D-334X	←	←	←
R7628	MG RESISTOR	NRSA63J-224X	—	—	—	NRSA63J-224X	←	←	←
R7629	MG RESISTOR	NRSA63J-393X	—	—	—	NRSA63J-393X	←	←	←
R7640	MG RESISTOR	NRSA63J-0R0X	—	—	—	NRSA63J-0R0X	←	←	←
R7641	MG RESISTOR	NRSA63J-0R0X	—	—	—	NRSA63J-0R0X	←	←	←
R7642	MG RESISTOR	NRSA63J-0R0X	—	—	—	NRSA63J-0R0X	←	←	←
R7643	MG RESISTOR	NRSA63J-0R0X	—	—	—	NRSA63J-0R0X	←	←	←
R7644	MG RESISTOR	NRSA63J-0R0X	—	—	—	NRSA63J-0R0X	←	←	←
R7645	MG RESISTOR	NRSA63J-0R0X	—	—	—	NRSA63J-0R0X	←	←	←
R7646	MG RESISTOR	NRSA63J-0R0X	—	—	—	NRSA63J-0R0X	←	←	←
C7103	T CAPACITOR	—	NBE20JM-475X	←	←	—	—	—	—
C7636	CAPACITOR	NCF31CZ-104X	—	—	—	NCF31CZ-104X	←	←	←
C7638	CAPACITOR	NCB21AK-225X	—	—	—	NCB21AK-225X	←	←	←
C7639	T CAPACITOR	NBE21AM-106X	—	—	—	NBE21AM-106X	←	←	←
L7605	COIL	—	NQL315K-100X	←	←	—	—	—	—
L7606	COIL	NQL315K-100X	—	—	—	NQL315K-100X	←	←	←
OT2	SHIELD SHEET	—	LY43119-001A	←	←	—	—	—	—

Notes : Mark ← is same as left.
 Mark — is not used.
 Mark * reference model was also changed.

LCD BL BOARD ASSEMBLY <03>

△ REF. No.	ITEM	MODEL	GR-DVL557EG	GR-DVL510A	GR-DVL510A-S	GR-DVL510EA	GR-DVL910A	GR-DVL910A-S	GR-DVL910EA
PW	LCD BL BOARD ASSY		YB10324A2-02	YB10325B	←	YB10324B2-02	YB10324A2-02	←	←
IC751	IC		MIP805	—	—	—	MIP805	←	←
D751	DIODE		1SS376	—	—	—	1SS376	←	←
R751	MG RESISTOR		NRSA63J-104X	—	—	—	NRSA63J-104X	←	←
C751	T CAPACITOR		NBE20JM-106X	—	—	—	NBE20JM-106X	←	←
C752	T CAPACITOR		NBE20JM-106X	—	—	—	NBE20JM-106X	←	←
C753	CAPACITOR		NCB31HK-222X	—	—	—	NCB31HK-222X	←	←
C754	CAPACITOR		NCB31HK-222X	—	—	—	NCB31HK-222X	←	←
L751	COIL		NQLZ011-681X	—	—	—	NQLZ011-681X	←	←
L752	COIL		NQL315K-100X	—	—	—	NQL315K-100X	←	←
CN754	FPC CONNECTOR		QGF0505F2-06X	—	—	—	QGF0505F2-06X	←	←
△F751	FUSE		NMFZ007-R20X-K	—	—	—	NMFZ007-R20X-K	←	←

JACK BOARD ASSEMBLY <03>

△ REF. No.	ITEM	MODEL	GR-DVL557EG	GR-DVL510A	GR-DVL510A-S	GR-DVL510EA	GR-DVL910A	GR-DVL910A-S	GR-DVL910EA
PW1	JACK BOARD ASSY		YB10314B1-02	*YB10314B1-03	*←	*←	*←	*←	*←

Notes : Mark ← is same as left.

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VICTOR COMPANY OF JAPAN, LIMITED
VIDEO DIVISION

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