				V	VORK INST	RUCTION					Effe	ctivity Date:			July 26, 202	1
			Process Name/Title:		TAPING	S ASSEMB	LY PRO	CESS				dity Date:			n/a	
	- 1		Model code/Part number:	101D / 7N0097-	7020A	Customer:	TRJ	Car Model:	TOYC	TA-RAV	<b>4</b> Doc	ument No.:			WI-ENG-PDE-23	9A
			Purpose:	PROTOTYPE		PRE-LAUNCH	l	MASSE	PRO		Rev	ision No.:		7	Page No.:	1 of 12
PARTS:		slit) Ø5 L		etor 6098-3802 (W); AVSSf 0.3 E d tube Ø5 L=171±3mm; Black co Black tape								JIG:	1. 1	Insertion ji	ig with switch cover	
N	0.	Р	ROCESS NAME		WORK PI	ROCEDURE	/ ILLUSTR	ATION				TOOLS/PPE		G	QUALITY POIN	TERS
		P1	Table Lay-out	Connector 6098- 2220 (W)/ Connector tray  Black (Su ø9 L=  Insertion jig (A w/ switch cove	k corrugated be (No slit) =316±3mm  VM tube (no slit) = 120±3mm  AVS	tube (	orrugated No slit) 71±3mm	Ø Black corru	k SV tube (\text{tube (\text{total tube L=275±3mm}})	(No slit)	1. 22 F	Safety Instruction Be sure to wear required personal rotective equipment of the control of the c	l l ent l says l. l 2. l l l l l l l l l l l l l l l l	6098-3 No missin No excess Docume	g parts/tools s parts/tools o WI-PRO-CNC-C Length Tolerand	8-5668 (W)
		Additiona	Work procedure/Illustration ar	d notes on page 4-5 as counterme	sion History	stomer claim (Bro	ken lock of		C.	C.		Prepared by	Reviev	ved by	Approved by	Noted by
7/26/24	7		6098-2220 (W)). Aligned switch					D. Castillo	Villanueva	Villanueva	A. Arañes					
7/26/23	6	process r reference	o.13,14,15,16 and 17 from P1 /s (pg.4 and 5-process 4).	heckpoints; Inclusion of Locking propertion to P2 due to new process distribution	on; Improve Qua	ality pointers/Note	s and	d M.Ariola	J.Loterte	C. Villanueva	A. Arañes	$\alpha$		/ •//	Alan	
04/04/23	5		n of Part number from 7N0097- tube to VM tube (Sunprene).	7020 to 7N0097-7020A. Change t	erm from Vinyl to	ube to SV tube (Vi	inyl) and	D. Castillo	C. Villanueva	C. Villanueva	A. Arañes	D. Castillo	C. Villa	2)//oww nueva	A. Arañes	n/a
ff. Date	Rev. No			Details of Change				Revised	Reviewed	Approved	Noted ,	Est. Date:	March 9, 2	2021		



			WORK INS	STRUCTION			Effectivity Date:		July 26, 2024	
		Process Name/Title:	TAPIN	NG ASSEMBLY PRO	CESS		Validity Date:		n/a	
		Model code/Part number:	101D / 7N0097-7020A	Customer: TRJ	Car Model:	TOYOTA-RAV4	Document No.:		WI-ENG-PDE-23	9A
		Purpose:	PROTOTYPE	PRE-LAUNCH	MASSPF	RO	Revision No.:	7	Page No.:	2 of 12
PARTS:		ector 6098-2220 (W)					JIG:	1. Insertion	jig with switch cover	
NO.	F	ROCESS NAME	WORK	PROCEDURE/ ILLUSTR	RATION		TOOLS/PPE	(	QUALITY POIN	TERS
2	P1	Connector setting to insertion jig 6098-2220 (W)	Insertion Jig With SWIT  OR-wire Jig  I-MARK Holes  1. Press the lock of insertion jig using left thumb.  Guide	Y-wire  2. Insert the conhand and releas	se the lock.  the connector orion  3. Push the	Release  0 (W) into jig using right	n/a	I-ma ali I-ma not a  1. Use the 2. No wror 3. No wror		1 hole is open  All holes were open  odel nnector

			WORK INS	STRUCTION			Effectivity Date:		July 26, 2024	,
		Process Name/Title:		IG ASSEMBLY PRO	CESS		Validity Date:		n/a	
		Model code/Part number:	101D / 7N0097-7020A	Customer: TRJ	Car Model:	TOYOTA-RAV4	Document No.:		WI-ENG-PDE-23	Δο
		Purpose:	☐ PROTOTYPE	PRE-LAUNCH	MASSPE		Revision No.:	7	Page No.:	3 of 12
PARTS:	1. AVSS	of 0.3 Y/OR wires L=713±3mn	n				JIG:	1. Insertion	jig with switch cover	
NO.	F	ROCESS NAME	WORK F	PROCEDURE/ ILLUSTF	RATION		TOOLS/PPE	(	QUALITY POIN	TERS
3	P1	Wire insertion to connector 6098-2220 (W)	1. Hold the insertion jig using left hand. On the Y wire and insert to connector using right hand.  1. Hold the insertion jig using left hand. Or the Y wire and insert to connector using right hand.  1. Orange wire and insert to connect using right hand.	Get g 2. Press the for OR wire	e button using rige will be opened.  Press  on, push the lock wires and gently p	Orange  R  ght thumb the slot  R  using left thumb and oull out the connector	n/a	1. Please during ir 2. Insertiright. 3. Make inserted conduct insertion Do not e  1. No loose 2. No wrong 3. One by c 4. No defor 5. No wrong Docume 1. Refer t and Strip	Jon must be from sure wires are properties.  Pull-Push-Pull-Pull-Pull-Pull-Pull-Push-Pull-Pull-Pull-Pull-Pull-Pull-Pull-Pul	ar terminal left to operly ush after

	_		WORK INS	STRUCTION			Effectivity Date:	T	July 26, 202	4
		Process Name/Title:		NG ASSEMBLY PRO	OCESS		Validity Date:	+	n/a	
		Model code/Part number:	101D / 7N0097-7020A	Customer: TRJ	Car Model:	TOYOTA-RAV4	Document No.:		WI-ENG-PDE-2	39A
		Purpose:	PROTOTYPE	PRE-LAUNCH	MASSPF	RO	Revision No.:	7	Page No.:	4 of 12
PARTS:	1. Assy	parts	_				JIG:	n/a		
NO.		PROCESS NAME	WORK	PROCEDURE/ ILLUST	<b>FRATION</b>		TOOLS/PPE	(	QUALITY POIN	ITERS
4	P1	Connector lock	GOOD  HANDLE  Sensor  Sensor	NG  RETAI SENS  and insert into connector keill be heard if properly lock.	INER SOR  Cocking jig based of		L 6098-2220 STEP 2 Make sure the	Inportal  Importal  Incompeted  Importal  Incompeted  Incompeted	or must be fully in slot.  ure no offset settir g setting of conne aged connector locked/ half-locked	r hit by any cking jig to avoid blding of wire to serted to ag before locking actor. book connector.  te/s: cess will alarm or cannot  lity, STOP and cention of the

			WORK INS	STRUCTION			Effectivity Date:	T	July 26, 202	1
		Process Name/Title:	TAPIN	IG ASSEMBLY PRO	CESS		Validity Date:		n/a	
		Model code/Part number:	101D / 7N0097-7020A	Customer: TRJ	Car Model:	TOYOTA-RAV4	Document No.:		WI-ENG-PDE-2	39A
		Purpose:	PROTOTYPE	PRE-LAUNCH	MASSPE	RO	Revision No.:	7	Page No.:	5 of 12
PARTS:	1. Assy	parts					JIG:	n/a		
NO.	ı	PROCESS NAME	WORK	PROCEDURE/ ILLUST	RATION		TOOLS/PPE		QUALITY POIN	TERS
4	P1	Connector lock (Continuation)	HOLD THE HANDLE  R  SLIDE  STEP 1	STEP 2	PULL-DOWN  R  SLIII	pull down and brir position after lock one time only.  DE  4. Remove the	ight hand then gentlying back to original ing. Note: Pull down	lock/retain object prio half-lock c 2. Maintair connector 3. Connect connector 4. Make su process. 5. No wron 6. No dam 7. No unlo support the jig. 2. No reproceed 3. If encimmedia leader. I	or must be fully insisted.  ure no offset setting setting of connectaged connector to cked/ half-locked of the full setting setting processing	thit by any king jig to avoid ding of wire to serted to g before locking etor. ck connector.

				( INSTRUCTION			Effectivity Date:		July 26, 2024	
		Process Name/Title:		APING ASSEMBLY PRO	CESS		Validity Date:		n/a	
		Model code/Part number:	101D / 7N0097-7020	OA Customer: TRJ	Car Model:	TOYOTA-RAV4	Document No.:		WI-ENG-PDE-23	€A
		Purpose:	PROTOTYPE	PRE-LAUNCH	MASSPE	RO	Revision No.:	7	Page No.:	6 of 12
PARTS:	1. Assy 2. Black	parts c corrugated tube (no slit) &	Ø5 L=316±3mm	3. Black corrugated t 4. Black SV tube (Vi	ube (no slit) Ø5 nyl) Ø5 L=182±3	L=171±3mm 3mm	JIG:	n/a	·	
NO.	F	ROCESS NAME	WC	RK PROCEDURE/ ILLUST	RATION		TOOLS/PPE	C	QUALITY POINT	ERS
5		Wire insertion to Black corrugated tube (no slit) Ø5 L=316±3mm Ø5 L=171±3mm	L	R		16±3mm using right ing left hand.  71±3mm using right ing left hand.	n/a	1. No wrong 2. No deforr	use of parts ned terminal	
6		Wire insertion to Black SV tube (Vinyl) Ø5 L=182±3mm	L	1. Get the E L=182±3mi OR wire us	Black SV tube (Vir n using right hand ing left hand.	nyl) Ø5 d then insert the <b>Y</b> -		1. No wrong 2. No deforr	use of parts ned terminal	

	_		WORK INS	STRUCTION			Effectivity Date:	T	July 26, 2024	
		Process Name/Title:		NG ASSEMBLY PROC	ESS		Validity Date:		n/a	
		Model code/Part number:	101D / 7N0097-7020A	Customer: TRJ		TOYOTA-RAV4	Document No.:		WI-ENG-PDE-23	39A
		Purpose:	PROTOTYPE	PRE-LAUNCH	MASSPR		Revision No.:	7	Page No.:	7 of 12
PARTS:	1. Conn	ector 6098-3802 (W)					JIG:	1.Insertion j	iig	
NO.	F	ROCESS NAME	WORK I	PROCEDURE/ ILLUSTR	ATION		TOOLS/PPE	(	QUALITY POIN	TERS
7	P1	Connector setting to insertion jig 6098-3802 (W)	Lock  Guide  Press  1. Press the lock of insertion jig using left thumb.	hand	8-3802 (W) into	ing left		I-mark i  1. Use the 2. No wron 3. No wron	GOOD	hole is open



				STRUCTION		Effectivity Date:		July 26, 2024	
		Process Name/Title:	TAPIN	NG ASSEMBLY PRO	CESS	Validity Date:		n/a	
		Model code/Part number:	101D / 7N0097-7020A	Customer: TRJ	Car Model: TOYOTA-RA	AV4 Document No.:		WI-ENG-PDE-239A	A
		Purpose:	PROTOTYPE	PRE-LAUNCH	MASSPRO	Revision No.:	7	Page No.:	8 of 12
PARTS:	1. Ass	·				JIG:	1.Insertion j		
NO.		PROCESS NAME	WORK F	PROCEDURE/ ILLUST	RATION	TOOLS/PPE	(	QUALITY POINTE	ERS
8	P1	Wire insertion to connector 6098-3802 (W)	1. Get the assy part and hold the Y withen insert to terminal slot 1 using right hand.	R  2. After insertic and then hold connector from	er insertion of Y wire press the n using right thumb. Slot for OR will be opened.  Press R  on, push the lock using left thumb the wires and gently pull out the n jig using right hand.	n/a	1. Pleastermina 2. Inservinght. 3. Make inserte conduct after in Do not  1. No loose 2. No wron 3. One by 4. No defo	ant reminders/Notice hold the wire is all during insertion retirements are ped.  ct Pull-Push-Pull-asertion.  e exert extra force insertion one insertion one insertion or insertion in terminal and wire facing	near on. om left to properly - <u>Push</u>

				INSTRUCTION		Effectivity Date:		July 26, 2024	
		Process Name/Title:		PING ASSEMBLY PRO		Validity Date:		n/a	
		Model code/Part number:	101D / 7N0097-7020	Customer: TRJ	Car Model: TOYOTA-RAV4	Document No.:		WI-ENG-PDE-239	9A
		Purpose:	PROTOTYPE	PRE-LAUNCH	MASSPRO	Revision No.:	7	Page No.:	9 of 12
PARTS:	1. Assy 2. AVSS	parts if 0.3 B-B wires L=791±3mm	[2pcs.]	Black corrugated tube     Black tape	e (no slit) Ø5 L=275±3mm	JIG:	n/a		
NO.	Р	ROCESS NAME	WO	RK PROCEDURE/ ILLUST	RATION	TOOLS/PPE	(	QUALITY POINT	ERS
9		Wire insertion to Black Corrugated tube (no slit) Ø5 L=275±3mm	L	L=275±3mm u	corrugated tube (no slit) Ø5 sing right hand and insert Black wires 2) using left hand.	n/a	2. No deform  Docume  1. Refer to	usage of parts ned terminal ent reference/s: b WI-PRO-CNC-01 Strip Length Tole	7 for
10	P1	Taping 1 Black corrugated tube to wire near terminal	Start of taping  1. Get the Black tape using right hand then make 2 windings of tape at the middle of COT and wire using both hands.  L  25±3mm  L  25±3mm	131±3mm 5 6 7 8 9 40 1 2 3	both hands going to other side	1	Importa 1. Use YE visualizat actual sh 2. Please measurin measurei Docume 1. Refer	off tape e tape ing tape g use of tape g dimension  ont reminders/No ELLOW TAPE tion of shifting line ould be BLACK To use calibrated/ve g tape when gettin	easy es, but A <u>PE.</u> rified ng the

	_		WORK INS	STRUCTION			Effectivity Date:		July 26, 2024	,
	AL	Process Name/Title:		IG ASSEMBLY F	PROCESS		Validity Date:		n/a	
		Model code/Part number:	101D / 7N0097-7020A	Customer: TR		TOYOTA-RAV4	Document No.:		WI-ENG-PDE-23	9A
		Purpose:	PROTOTYPE	PRE-LAUNCH	MASSPE	RO	Revision No.:	7	Page No.:	10 of 12
PARTS:	1. Assy 2. Black 3. Black	VM tube (Sunprene) Ø9 L=1	20±3mm				JIG:	n/a		
NO.	F	PROCESS NAME	WORK I	PROCEDURE/ ILLI	USTRATION		TOOLS/PPE	(	QUALITY POIN	ΓERS
11		Wire insertion to Black VM tube (Sunprene) Ø9 L=120±3mm	20mm L 2. Insert the V	1. Ge L=12 assy	et the Black VM tube (\$20±3mm using right hard parts using left hand.		n/a		g use of parts med terminal	
12	P1	Taping 2 Black VM tube (Sunprene) to Black corrugated tube (no slit) near terminal	1. Measure from end of VM tube (S terminal pointed tip 31±3mm using	R Sunprene) up to	2. Get the Black tape make 2 windings of VM tube (Sunprene) a hands.			6. No wron  Importa  1. Use ] visualiz actual s 2. Pleas measur measur Docum 1. Refer	-off tape e tape sing tape ng use of tape ng dimension  ant reminders/N YELLOW TAPE for exation of shifting it should be BLACK se use calibrated/ ring tape when ge	or easy ines, but TAPE. verified tting the

			WORK INS	STRUCTION			Effectivity Date:		July 26, 2024	1
		Process Name/Title:	TAPIN	NG ASSEMBLY PRO	CESS		Validity Date:		n/a	
		Model code/Part number:	101D / 7N0097-7020A	Customer: TRJ	Car Model:	TOYOTA-RAV4	Document No.:		WI-ENG-PDE-23	39A
		Purpose:	PROTOTYPE	PRE-LAUNCH	MASSPF	RO	Revision No.:	7	Page No.:	11 of 12
PARTS:	1. Assy 2. Black	tape					JIG:	n/a		
NO.	F	ROCESS NAME	WORK	PROCEDURE/ ILLUSTF	RATION		TOOLS/PPE	(	QUALITY POIN	TERS
12	P1	Taping 2 Black VM tube (Sunprene) to Black corrugated tube (no slit) near terminal (Continuation)		side of sunprene 2 windings of tap	shifting using be COT then make the tape.	ands going to the tamm then make g to other side.  oth hands going to a windings of 3 windings of R	MEASURING TAPE  6 7 8 9 10 1 2 3 4 5 6 7 8 9 6	1. Use visualizactual sectual section	ut tape off tape : tape	for easy lines, but <u>K TAPE.</u> d/verified etting the

				WORK INST				Effectivity Date:		July 26, 2024	1
		ocess Name/			S ASSEMBLY PR			Validity Date:		n/a	
	Mo	odel code/Pai		0097-7020A	Customer: TRJ	Car Model:	TOYOTA-RAV4	Document No.:		WI-ENG-PDE-23	39A
	Pu	rpose:	PROTOTYPE		PRE-LAUNCH	MASSP	RO	Revision No.:	7	Page No.:	12 of 12
PARTS:	1. Assy pa	rts						JIG:	n/a		
	1			VISU	JAL INSPECTION/ (	UALITY CHE	CKPOINTS		•		
P1	L				7N00	97-7	7020A				
E			1 2 X			3					
G	OOD		GOOD			3		GOOD		GOC	DD
E			1 2 X							rio di	
NO	GOC	DD	NO GOOD		-			NO		NO	
	No Un Halflo	-	Connector	lo Wrong on 2 connec	g Insert 3 ctor)	🖊 (taping	lissing Tapo g on COT-wire on VM tube rene)	( /1 )	No Te	erminal B	acking