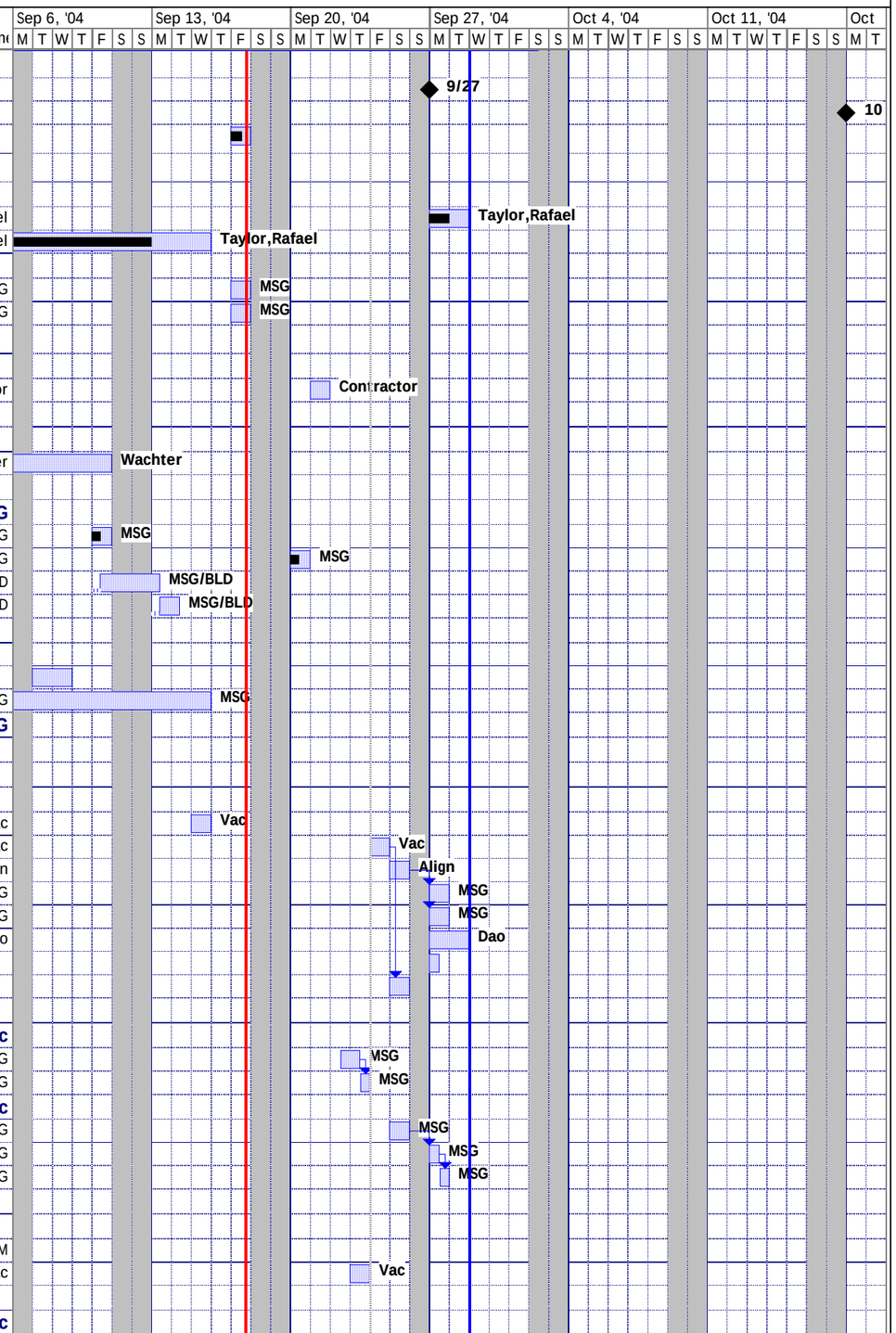
SPEAR DOWNTIME SCHEDULE

Fri 9/24

ID	Task Name	Duration	Start	Finish	Prede	Project Manag	Resource Name
1	**MILESTONES**	**55 days?**	**Sat 7/31**	**Mon 10/18**			
6	SPEAR Lockup	0 days	Mon 9/27	Mon 9/27			
7	BEAM to Users	0 days	Mon 10/18	Mon 10/18			
17	**DOWNTIME**	1 day?	Fri 9/17	Fri 9/17			
18	**INJECTOR**	**40 days?**	**Mon 8/9**	**Fri 10/1**			
44	**Booster PS:**	**36 days?**	**Tue 8/10**	**Tue 9/28**			
45	Test Board Interface (Bias, Pulse, B2-B6)	2 days	Mon 9/27	Tue 9/28		Rafael	Taylor,Rafael
48	Install the blown fuse detector	12 days	Mon 8/30	Wed 9/15		Rafael	Taylor,Rafael
63	**Gun**	**1 day?**	**Fri 9/17**	**Fri 9/17**			
64	Install New NESLAB Chiller (Need LINAC Access)	1 day?	Fri 9/17	Fri 9/17			MSG
65	Install New E-Gun RTD	1 day?	Fri 9/17	Fri 9/17			MSG
74	**SPEAR**	**53 days?**	**Fri 7/16**	**Tue 9/28**			
76	**Facilities**	**27 days?**	**Fri 8/13**	**Tue 9/21**			
79	B118 fire alarm tie-in	1 day	Tue 9/21	Tue 9/21		Shewchuk	Contractor
88	**Beam Monitoring and Diagnostics**	**14 days?**	**Mon 8/23**	**Fri 9/10**		**Martin**	
89	**BPM System**	**14 days?**	**Mon 8/23**	**Fri 9/10**		**Martin**	
90	Testing Test Tone couplers (50ea)	14 days?	Mon 8/23	Fri 9/10			Wachter
108	**Shielding**	**15 days**	**Mon 8/30**	**Mon 9/20**			
109	**Phase II Shielding**	**15 days**	**Mon 8/30**	**Mon 9/20**		**Boyce**	**MSG**
110	Remove S1 Shielding for Scraper Install	1 day	Fri 9/10	Fri 9/10			MSG
112	S1 Install Scraper Shielding	1 day	Mon 9/20	Mon 9/20			MSG
129	SLM Install Mask Down Beam cf/m	1 day	Fri 9/10	Mon 9/13	127		MSG/BLD
130	SLM Install Pb Mask Up Beam Mag	1 day	Mon 9/13	Tue 9/14			MSG/BLD
131	**LCW and Pneumatics Systems**	**30 days?**	**Wed 8/4**	**Wed 9/15**		**Nzeadibe**	
135	Inspect Magnet Electrical Connections	1 day	Fri 8/27	Fri 8/27			
136	Install LCW to New SR mask 9,10	2 days	Tue 9/7	Wed 9/8			
145	BL FE needle valve replacement (w/ restrictor tubes)	21 days	Tue 8/17	Wed 9/15			MSG
162	**GENERAL MECHANICAL**	**16 days?**	**Wed 8/11**	**Wed 9/1**			**MSG**
173	**Vacuum System**	**53 days?**	**Fri 7/16**	**Tue 9/28**		**Morales**	
175	**Zone 1**	**46 days?**	**Tue 7/27**	**Tue 9/28**			
178	**S1 Scraper Installation**	**46 days?**	**Tue 7/27**	**Tue 9/28**		**Ringwall**	
183	Remove Existing S1 Spool (Compress Bellows Slightly to Facilitate Remova	1 day?	Wed 9/15	Wed 9/15			Vac
184	Install Scraper Chamber, Connect to Bellows	1 day	Fri 9/24	Fri 9/24	181		Vac
186	Align Scraper Chamber	1 day?	Sat 9/25	Sat 9/25			Align
187	Add LCW to S1 Scraper	1 day?	Mon 9/27	Mon 9/27	186		MSG
188	Re-Install Aisle Side Lead Shielding	1 day?	Mon 9/27	Mon 9/27	186		MSG
189	Test X & Y Motion Control	2 days	Mon 9/27	Tue 9/28			Dao
190	Connect Scraper into PPS	0.5 days	Mon 9/27	Mon 9/27			
191	Pumpdown Zone 1	1 day	Sat 9/25	Sat 9/25	184		
193	**Zone 2**	**52 days**	**Fri 7/16**	**Mon 9/27**		**Morales**	
195	**S6 ID SR Masks (BL 10)-Upgrade to 500mA**	**49 days**	**Fri 7/16**	**Thu 9/23**		**, Trautwein**	**Vac**
202	Re-Install LCW	1 day	Wed 9/22	Thu 9/23	201		MSG
203	Re-Install Plexiglas Covers at Side, Back and Front	0.5 days	Thu 9/23	Thu 9/23	202		MSG
204	**S7 ID SR Masks (BL9)-Upgrade to 500mA**	**52 days**	**Fri 7/16**	**Mon 9/27**			**Vac**
212	Re-Install LCW	1 day	Sat 9/25	Sat 9/25	211		MSG
213	Re-Install Shielding attached to G7	0.5 days	Mon 9/27	Mon 9/27	212		MSG
214	Re-Install Plastic Cover Above Upbeam Mask	0.5 days	Mon 9/27	Mon 9/27	213		MSG
215	**S8 RGA**	**27.5 days**	**Thu 8/5**	**Tue 9/14**			
220	**Ring Preparation**	**9.5 days**	**Mon 8/23**	**Fri 9/3**			
221	Terminate/Test RS422 Cable From S8 to SPEAR Control Room	0.5 days	Mon 8/23	Mon 8/23			EDM
223	Pump down Zone 2	1 day	Thu 9/23	Thu 9/23			Vac
235	**Zone 4**	**50 days?**	**Fri 7/16**	**Fri 9/24**		**Morales**	
237	**S15 ID SR Masks (BL 11)-Upgrade to 500mA**	**48.7 days**	**Fri 7/16**	**Thu 9/23**		**, Trautwein**	**Vac**



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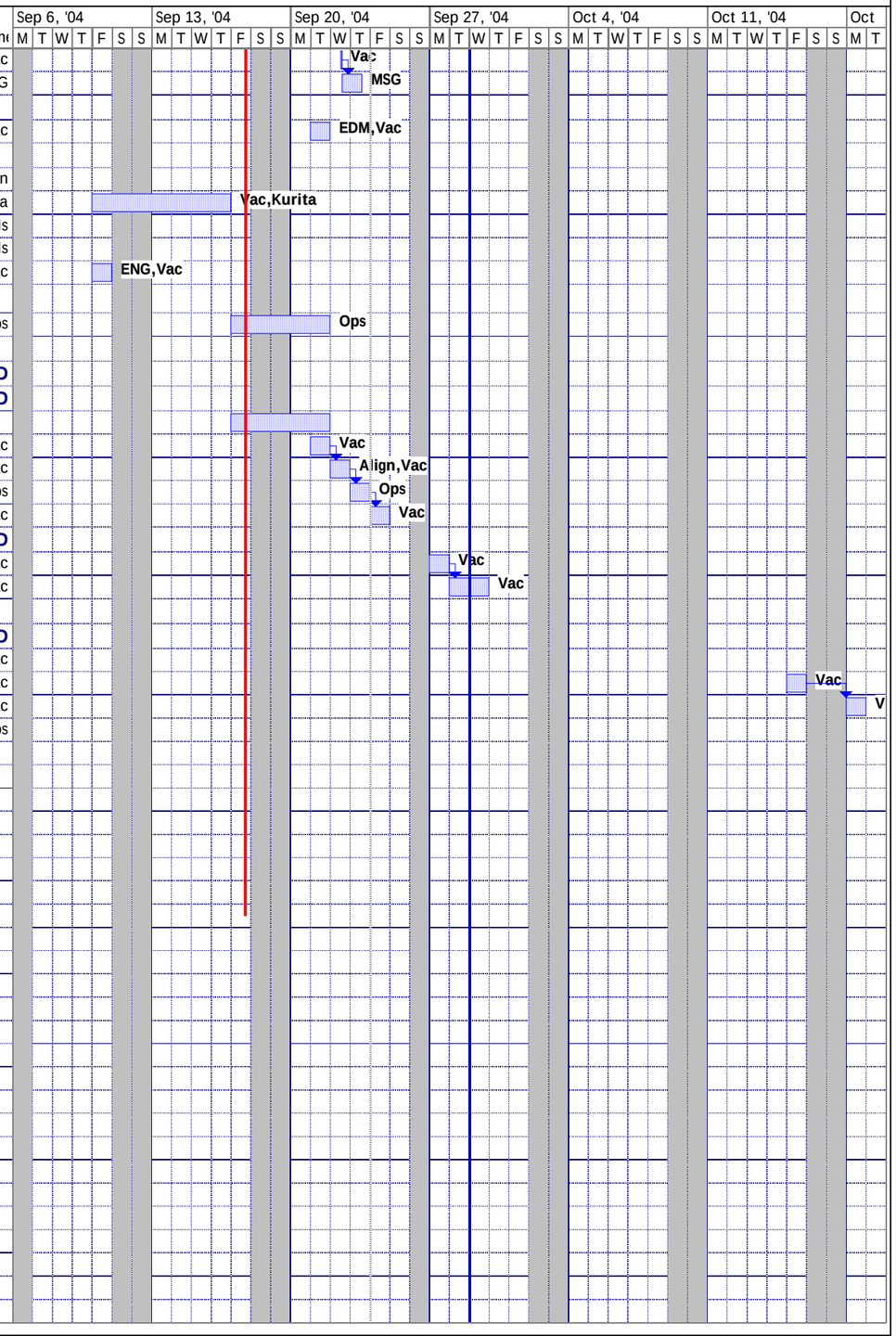
ID	Task Name	Duration	Start	Finish	Predec	Project Manag	Resource Name
243	Replace Varian Right Angle Valve at ID Chamber	0.2 days	Wed 9/22	Wed 9/22	242		Vac
244	Re-Install LCW	1 day	Wed 9/22	Thu 9/23	243		MSG
252	**General Maintenance**	**36 days?**	**Mon 8/2**	**Tue 9/21**			
255	Fix ion gauges (reading 0) Qty ~10	1 day?	Tue 9/21	Tue 9/21			EDM,Vac
256	**Instrumentation**	**12 days**	**Tue 8/31**	**Thu 9/16**			
257	Modify BL software	1 day	Tue 8/31	Tue 8/31			Horton
258	Adjust IP Ball Plungers	5 days	Fri 9/10	Thu 9/16			Vac,Kurita
259	Add BL IV open/close status to SP Vac printout	1 day	Tue 8/31	Tue 8/31			Controls
260	Modify SPEAR status page	1 day	Tue 8/31	Tue 8/31			Controls
261	Update Vac Instrumentation Dwg	1 day	Fri 9/10	Fri 9/10			ENG,Vac
262	**BEAM LINES**	**61 days?**	**Mon 7/26**	**Mon 10/18**			
271	Close Beamline Wall Blocks (BL 5, 6, 9, 10,)	3 days	Fri 9/17	Tue 9/21			Ops
278	**BL6 - Upgrade to 500mA**	**48 days?**	**Mon 7/26**	**Wed 9/29**			
279	**In Alcove**	**43 days?**	**Mon 7/26**	**Thu 9/23**			**BLD**
285	**Pivot mask through ratchet wall**	**43 days?**	**Mon 7/26**	**Thu 9/23**			**BLD**
286	Bake PM & Bellows	3 days?	Fri 9/17	Tue 9/21			
289	Install Pivot Mask	1 day	Tue 9/21	Tue 9/21			Vac
290	Align Pivot Mask	1 day	Wed 9/22	Wed 9/22	289		Align,Vac
291	Restack Shielding Around Pivot Mask	1 day	Thu 9/23	Thu 9/23	290		Ops
292	Pumpdown Beamline 6	1 day	Fri 9/24	Fri 9/24	291		Vac
293	**Out of Alcove**	**42 days**	**Tue 8/3**	**Wed 9/29**			**BLD**
295	Install Remaining Out of Alcove Components	1 day	Mon 9/27	Mon 9/27			Vac
297	Chill LN Monochromator	2 days	Tue 9/28	Wed 9/29	295		Vac
301	**BL10 - Upgrade to 500mA**	**61 days?**	**Mon 7/26**	**Mon 10/18**			
302	**Out of Alcove**	**61 days?**	**Mon 7/26**	**Mon 10/18**			**BLD**
303	Install 10-1 Mono Entrance Slit	1 day?	Mon 7/26	Mon 7/26			Vac
304	Install 10-2 mono slits	1 day?	Fri 10/15	Fri 10/15			Vac
305	Install Graphite filters, Be window	1 day?	Mon 10/18	Mon 10/18	304		Vac
306	Redo LCW System	1 day?	Mon 7/26	Mon 7/26			Ops