

Brass Gear Chart by Gene Maddox - for Spookshow N Scale Loco Encyclopedia										
1	2	3	4	5	6	7	8	9	10	11
Manuf	Importer	Engine Type	Tower	Tower	Tower	Gearbox	Gearbox	Gear on	Wheel	Gear
			Worm	Dble Spur	Dble Spur	Top Drive	Axle Idler	Wheelset	Diameter	Ratio
			Gear	Small Gear	Large Gear	Gear	Gear		Model/	
			Teeth/Diam.	Teeth/Diam.	Teeth/Diam.				Prototype	
Sam	HMM	B40-8,B40-8W		14/.156	18/.000					
Sam	HMM	C40-8,C40-8W		14/.156	22/.000	20/.216	13/.157	14/.156	.256/	
Sam	HMM	DL 109/110 A&B	6/.131	14/.156	22/.237	20/.216	14/.156	16/.176	.256/40"	25.14:1
Sam	HMM	DL 109/110 A&B Hi.Spd.	6/.171	14/.156	18/.198	20/.216	14/.156	16/.176	.256/40"	20.57:1
Sam	OL	E7,8 A&B	4/.172	14/.156	12/.221	17/.186			36"	14.57:1
Sam	Key	FA1 A&B		14/.156	17/.000					
Sam	HMM	FT A 1st Run	5/.165	14/.156	16/.211	17/.186	17/.186	17/.186	.245/40"	19.43:1
Sam	HMM	FT A/B 2nd Run	see note		16/.211					
Sam	HMM	F3,F7,F9 A&B	4/.163	14/.156	14/.220	17/.186	17/.186	17/.186	.245/40"	17.00:1
Sam	PFM	F40PH	/.140	14/.156	18/.235	17/.186				21.86:1
Sam	HMM	GP7,GP9 A&B-1st run	6/.121	14/.156	23/.249	17/.186	17/.186	17/.186	.245/40"	27.93:1
Sam	HMM	GP7,GP9 A&B-2nd run	4/.165	14/.156	16/.221	17/.186	17/.186	17/.186	.245/40"	
Sam	HMM	GP18,GP20-1st run	6/.121	14/.156	23/.249	17/.186	17/.186	17/.186	.245/40"	27.93:1
Sam	HMM	GP30/GP30B/GP35	7/.120	14/.156	23/.245	17/.186	17/.186	17/.186	.250/40"	27.93:1
Sam	HMM	GP38,GP39/GP40	7/.111	14/.156	24/.155	17/.186	17/.186	17/.186	.243/40"	29.14:1
Sam	HMM	M-190	4/.165	14/.156	14/.222	14/.157	15/.166	16/.176	.225/40"	16.00:1
Sam	HMM	M-190-Hi.Spd.	4/.172	14/.156	12/.221	14/.157	15/.166	16/.176	.225/40"	13.71:1
Sam	OL	RS2,RS3,RSD4/5	6/.121	14/.156	23/.249	17/.186	17/.186	17/.186	.245/40"	27.93:1
Sam	Key	S1,S2,S3,S4,S12	6/.152	14/.156	20/.216	14/.157	15/.166	16/.176	.225/40"	22.86:1
Sam	HMM	SD45/SD45B		14/.156	17/.225	20/.216	15/.166		40"	
Sam	HMM	U23,U30,U33,U36 B	6/.152	14/.156	20/.216	17/.186	18/.196	17/.186	.250/40"	24.25:1
Sam	HMM	U23,U30,U33,U36 C	6/.152	14/.156	17/.225	20/.216	14/.156	14/.156	.250/40"	17.00:1
Sam	HMM	U-50-B	5/.152	14/.156	17/.225	17/.186	18/.196	17/.186	.250/40"	20.64:1
Sam	HMM	U-50-B-Hi. Spd.	4/.172	14/.156	12/.221	17/.186	18/.196	17/.186	.250/40"	14.57:1
Sam	HMM	VO-1000	6/.152	14/.156	20/.216	14/.157	15/.166	16/.176	.245/40"	22.86:1
Ajin	OMI	Overland Turbine						15/.200	.250/40'	

**Note:Hallmark Dash 8-40C & CW**

On "C" units, check to see if the 2 rear wheels in the truck assy are free wheeling when unit is upside down, if so the 20 tooth idler gear is "floating" off the 14 tooth idler or is loosing contact. File down the machine surface on the top truck casting to reduce the distance between the 20 tooth idler and the 14 tooth step gear.The gear tower box holds the shaft of the 20 tooth gear in place & reducing the thickness of the top truck casting firms up the fit.