

Table 1

Lab 1					
Part 1					
SKU (long int)	ProductName (String)				
SKU (long int)	Count (int)	Price (float)			
SKU (long int)	Aisle (int)	ProductName (String)	Price (float)		
SKU (long int)	Aisle (int)				
VIN (long int)	Make (String)	Model (String)	Year (Date)	Color (String)	
VIN (long int)	SSN (long int)				
SSN (long int)	Name (String)				
Part 2					
CREATE TABLE Patrons ( CardNum int NOT NULL, Name varchar (255) NOT NULL, PRIMARY KEY (CardNum) )					
CREATE TABLE Inventory( Serial int NOT NULL, ISBN varchar (255) NOT NULL, PRIMARY KEY (Serial) )					
CREATE TABLE CheckedOut( CardNum int NOT NULL, Serial varchar (255) NOT NULL, CONSTRAINT PK_CheckedOut PRIMARY KEY (CardNum, Serial) )					
CREATE TABLE Phones( CardNum int NOT NULL, Phone varchar (255) NOT NULL, CONSTRAINT PK_Phones PRIMARY KEY (CardNum, Phone), FOREIGN KEY (CardNum) REFERENCES Patrons(CardNum) )					
CREATE TABLE Titles( ISBN varchar (255) NOT NULL, Title varchar (255) NOT NULL, Author varchar (255) NOT NULL, CONSTRAINT PK_Titles PRIMARY KEY (ISBN, Title, Author), FOREIGN KEY (ISBN) REFERENCES Inventory(ISBN) )					
Part 3					
VIN (long int)	Make (String)	Model (String)	Year (Date)	Color (String)	
12345	Toyota	Tacoma	2008	Red	
11223	Toyota	Tacoma	1999	Green	
22113	Tesla	Model 3	2018	White	
45112	Subaru	WRX	2016	Blue	
54321	Ford	F150	2004	Red	
SSN (long int)	Name (String)				
111111111	Arnold				
222222222	Hannah				

<b>Lab 1</b>					
<b>333333333</b>	Steve				
<b>VIN (long int)</b>	<u>SSN (long int)</u>				
<b>12345</b>	<b>111111111</b>				
<b>11223</b>	<b>111111111</b>				
<b>12345</b>	<b>222222222</b>				
<b>54321</b>	<b>222222222</b>				
<b>22113</b>	<b>333333333</b>				
<b>Part 4</b>					
<b>Attribute Sets</b>	<b><u>Superkey?</u></b>	Proper Subsets	Key?		
<b>A1</b>	<b>NO</b>	{}	NO		
<b>A2</b>	<b>NO</b>	{}	NO		
<b>A3</b>	<b>NO</b>	{}	NO		
<b>A1, A2</b>	<b>YES</b>	{A1}, {A2}	YES		
<b>A1, A3</b>	<b>NO</b>	{A1}, {A3}	NO		
<b>A2, A3</b>	<b>NO</b>	{A2}, {A3}	NO		
<b>A1, A2, A3</b>	<b>YES</b>	{A1, A2}{A3}, {A1, A3}{A2}, {A2, A3}{A1}	NO		
<b>Part 5</b>					
<b>1</b>	<b>True</b>	If x is unique than all other sets that contain x must be unique as well			
<b>2</b>	<b>False</b>	If x is a key than it is possible to have a set that contains x and is a super key but not a key			
<b>3</b>	<b>True</b>	No two rows have the same values in that field			
<b>4</b>	<b>False</b>	The combination is what may make it unique			
<b>5</b>	<b>TRUE</b>	{x,y,z} must create unique combinations.			



Lab 1	
333333333	
VIN (long int)	
12345	
11223	
12345	
54321	
22113	
Part 4	
Attribute Sets	
A1	
A2	
A3	
A1, A2	
A1, A3	
A2, A3	
A1, A2, A3	
Part 5	
1	
2	
3	
4	
5	