

The dataset consists of 36k observations and 27 features. The observations are of accidents that occurred in intercity roads and between the years 2017 and 2019. Each observation describes a single accident event where this event could involve more than one vehicle or individual. The features found in this dataset description of the accident circumstances, including but not limited to the accident location, environment, and time. The table below describes these features in further detail:

Feature name	Definition	Feature values	Dimension	Data Type
Rno (Road Number)	The number encoding of the road where the accident happened in.	The dataset has 722 main roads encoded in numbers. Examples of road numbers: 15,40, and 5.	Location	Numerical
Region	The administrative region of where the accident happened in.	This feature has 13 unique values which are listed below: <ul style="list-style-type: none"> <li>Riyadh</li> <li>EP</li> <li>Mecca</li> <li>Madina</li> <li>Qassim</li> <li>Hail</li> <li>Assir</li> <li>Jazan</li> <li>Baha</li> <li>Najran</li> <li>Tabuk</li> <li>Jawf</li> <li>Northern boarder</li> </ul>	Location	Categorical
Lat	The GPS location X coordinate of the accident.	-	Location	Numerical
Long	The GPS location Y coordinate of the accident.	-	Location	Numerical
Geometric Road Type	The geometric shape of the road where the accident happened.	This feature has 9 unique values which are listed below: <ul style="list-style-type: none"> <li>طريق مستقيم Straight link</li> <li>منحنى أفقي Horizontal Curve</li> <li>منحنى رأسي Vertical Curve</li> <li>تقاطع سطحي ثلاثي 3-Leg intersection</li> <li>تقاطع سطحي رباعي 4-Leg intersection</li> <li>تقاطع علوي Interchange</li> <li>فتحة دوران U-turn</li> <li>نفق منحدر Tunnel High Slope Road</li> </ul>	Environment	Categorical
Road Type	The type of the road where the accident happened	This feature has 6 unique values which are listed below: <ul style="list-style-type: none"> <li>مزدوج</li> <li>مفرد</li> <li>عقبة</li> <li>سريع</li> <li>سريع مع خدمة</li> <li>سريع اتجاهين</li> </ul>	Environment	Categorical

Road Status	The status of the accident road before the accident occurs.	This feature has 8 unique values which are listed below: <ul style="list-style-type: none"> <li>• جيدة Good</li> <li>• أعمال بالطريق Maintenance of the road</li> <li>• رمال sands</li> <li>• تشققات وحفر Cracks and fossils</li> <li>• نقص في وسائل السلامة Lack of means of safety</li> <li>• جاف dry</li> <li>• رطب wet</li> <li>• أخرى Other</li> </ul>	Environment	Categorical
Damage Road Type	A classification of the road damages resulted from the accident.	This feature has 10 unique values which are listed below: <ul style="list-style-type: none"> <li>• حفرة hole</li> <li>• تشقق crackle</li> <li>• لوحة إرشادية informative board</li> <li>• حواجز خرسانية concrete barriers</li> <li>• حواجز معدنية metal barriers</li> <li>• حواجز كيلبية Caplet barriers</li> <li>• إنارة أعمدة lighting poles</li> <li>• حاجز معدني و لوحة إرشادية a metal barrier and informative board</li> <li>• سياج مع عبارة مع سياج painting and fence</li> <li>• سياج عبارة fence</li> </ul>	Environment	Categorical
Weather Status	The status of the weather when the accident happened	This feature has 4 unique values which are listed below: <ul style="list-style-type: none"> <li>• ممطر rainy</li> <li>• ضباب fog</li> <li>• مغبر dusty</li> <li>• جيدة good</li> </ul>	Environment	Categorical
Safety tool: Paints	Binary variable that indicates whether the road where the accident happened has paints.	1 for yes	Environment	Binary
Safety tool: Eyes	Binary variable that indicates whether the road where the accident happened has eyes.	1 for yes	Environment	Binary
Accident Date	The date when the accident happened in Gregorian format. The format of the dates is YYYY/MM/DD	Ranges from 2017/01/01 to 2019/04/16.	Time	Datetime
Accident Time	The time when the accident happened in 12 hours format.	The following are some examples: 03:20 AM 03:20 PM	Time	Datetime
Number of Deaths	The number of people died as a result of the accident.	-	Accident	Numerical
Number of Injuries	The number of people injured as a result of the accident.	-	Accident	Numerical
Accident Type	A classification of the accidents that describes how the accident occurred.	This feature has 13 unique values which are listed below: <ul style="list-style-type: none"> <li>• تصادم crash</li> <li>• انقلاب coup</li> <li>• دهس انسان tread man</li> <li>• دهس حيوان tread animal</li> <li>• انحراف على الطريق deflection</li> <li>• اشتعال احتراق او اشتعال burning or ignition</li> <li>• تصادم انقلاب وتصادم coup and crash</li> <li>• انفجار بنشر كفر Explosion of a car tire</li> <li>• سرعة زائدة overdrive</li> <li>• انزلاق sliding</li> <li>• تصادم مباشر direct crash</li> <li>• تصادم من الخلف crush from behind</li> <li>• تصادم من الجنب collateral crush</li> </ul>	Accident	Categorical

		<ul style="list-style-type: none"> <li>• تصادم مع جسم ثابت على الطريق crush with a stationary body on the road</li> </ul>		
Vehicle type: Car	Binary variable that indicates whether the type of one of the vehicles involved in the accident is a car.	1 for yes	Vehicle	Binary
Vehicle type: Small Truck	Binary variable that indicates whether the type of one of the vehicles involved in the accident is a small truck.	1 for yes	Vehicle	Binary
Vehicle type: Big Truck	Binary variable that indicates whether the type of one of the vehicles involved in the accident is a big.	1 for yes	Vehicle	Binary
Vehicle type: Other Cars	Binary variable that indicates whether the type of one of the vehicles involved in the accident is not a car nor a truck. Example of other possible vehicle type is a bus.	1 for yes	Vehicle	Binary
Crash cause: Driver	Binary variable that indicates whether the driver was a cause of the accident.	1 for yes	Accident	Binary
Crash cause: Way	Binary variable that indicates whether the way was a cause of the accident.	1 for yes	Accident	Binary
Crash cause: Vehicle	Binary variable that indicates whether the vehicle was a cause of the accident.	1 for yes	Accident	Binary
Crash cause: Animal	Binary variable that indicates whether the animal was a cause of the accident.	1 for yes	Accident	Binary
Number of Vehicles	The number of vehicles involved in the accident.	-	Accident	Numerical
Road Close Days	The number of days where the road was closed as a result of the accident.	-	Environment	Numerical
Road Close Hours	The number of hours where the road was closed as a result of the accident	-	Environment	Numerical