

**APPENDIX 3.5-A –
GREENHOUSE GASES ANALYSIS DATA**

Rincon Del Rio Continuing Care Retirement Community
Construction-Generated
Greenhouse Gas Emissions

Project Action	CO2 (pounds)	Gallons of Diesel Fuel	N2O (grams)	N2O (pounds)	CH4 (grams)	CH4 (Pounds)
Phase 1 and Phase 2						
Construction	5,751.00	257.02	67	0.147	149	0.329
Phase 3						
Construction	2,349.00	104.98	27	0.060	61	0.134
Phase 4						
Construction	2,349.00	104.98	27	0.060	61	0.134
Phase 5						
Construction	2,349.00	104.98	27	0.060	61	0.134
Phase 6						
Construction	2,349.00	104.98	27	0.060	61	0.134
Phase 7						
Construction	2,349.00	104.98	27	0.060	61	0.134
Phase 8						
Construction	3,952.00	176.62	46	0.101	102	0.226
Phase 9						
Construction	2,349.00	104.98	27	0.060	61	0.134
Phase 10						
Construction	2,349.00	104.98	27	0.060	61	0.134
Trail System						
Construction	6,428.00	287.27	75	0.165	167	0.367

Sources:

Carbon Dioxide Emissions: URBEMIS 2007v.9.2.4; Conversion Ratios: California Climate Action Registry, 2009

Rincon Del Rio Continuing Care Retirement Community
Construction-Generated
Greenhouse Gas Emissions

Project Action	CO2 (tons)	CO2 (pounds)	Gallons of Diesel Fuel	N2O (grams)	N2O (pounds)	CH4 (grams)	CH4 (Pounds)	CO2e lbs/year
Phase 1 and Phase 2								
Construction (2012)	363	726,000.00	32,445.48	8,436	18.598	18,818	41.487	732,636.56
Phase 3 and Phase 4								
Construction (2013)	157	314,000.00	14,032.89	3,649	8.044	8,139	17.944	316,870.36
Phase 5 and Phase 6								
Construction (2014)	125	250,000.00	11,172.69	2,905	6.404	6,480	14.286	252,285.32
Phase 7 and Phase 8								
Construction (2015)	170	340,000.00	15,194.85	3,951	8.710	8,813	19.429	343,108.03
Phase 9 and Phase 10								
Construction (2016)	133	266,000.00	11,887.74	3,091	6.814	6,895	15.201	268,431.58
Trail System Development Phase								
Construction (2017)	92	184,000.00	8,223.10	2,138	4.713	4,769	10.515	185,681.99

Sources:

Carbon Dioxide Emissions: URBEMIS 2007v.9.2.4; Conversion Ratios: California Climate Action Registry, 2009

Urbemis 2007 Version 9.2.4

Combined Summer Emissions Reports (Pounds/Day)

File Name: H:\AQ-GHG Models\Rincon del Rio\Construction Emissions - Phase 1 and 2 - Building Construction.urb924

Project Name: Rincon Del Rio - Phases 1 and 2 - Building Construction Model

Project Location: Mountain Counties Air Basin

On-Road Vehicle Emissions Based on: Version : Emfac2007 V2.3 Nov 1 2006

Off-Road Vehicle Emissions Based on: OFFROAD2007

Summary Report:

CONSTRUCTION EMISSION ESTIMATES

CO2

2012 TOTALS (lbs/day unmitigated)	3,402.34
2012 TOTALS (lbs/day mitigated)	3,402.34

Construction Unmitigated Detail Report:

CONSTRUCTION EMISSION ESTIMATES Summer Pounds Per Day, Unmitigated

CO2

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Time Slice 2/2/2012-3/12/2012	2,349.22
Active Days: 28	
Mass Grading 02/02/2012-03/12/2012	2,349.22
Mass Grading Dust	0.00
Mass Grading Off Road Diesel	2,247.32
Mass Grading On Road Diesel	0.00
Mass Grading Worker Trips	101.91
Time Slice 3/13/2012-3/30/2012	1,689.83
Active Days: 14	
Asphalt 03/13/2012-04/01/2012	1,689.83
Paving Off-Gas	0.00
Paving Off Road Diesel	1,272.04
Paving On Road Diesel	213.98
Paving Worker Trips	203.81
Time Slice 4/2/2012-10/22/2012	<u>3,402.34</u>
Active Days: 146	
Building 04/01/2012-10/22/2012	3,402.34
Building Off Road Diesel	1,621.20
Building Vendor Trips	353.48
Building Worker Trips	1,427.66
Time Slice 10/23/2012-12/7/2012	164.02
Active Days: 34	
Coating 10/23/2012-12/07/2012	164.02
Architectural Coating	0.00
Coating Worker Trips	164.02

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Phase Assumptions

Phase: Mass Grading 2/2/2012 - 3/12/2012 - Mass Site Grading Description

Total Acres Disturbed: 10.05

Maximum Daily Acreage Disturbed: 2.51

Fugitive Dust Level of Detail: Default

20 lbs per acre-day

On Road Truck Travel (VMT): 0

Off-Road Equipment:

1 Graders (174 hp) operating at a 0.61 load factor for 6 hours per day

1 Rubber Tired Dozers (357 hp) operating at a 0.59 load factor for 6 hours per day

1 Tractors/Loaders/Backhoes (108 hp) operating at a 0.55 load factor for 7 hours per day

1 Water Trucks (189 hp) operating at a 0.5 load factor for 8 hours per day

Phase: Paving 3/13/2012 - 4/1/2012 - Paving Description

Acres to be Paved: 2.51

Off-Road Equipment:

4 Cement and Mortar Mixers (10 hp) operating at a 0.56 load factor for 6 hours per day

1 Pavers (100 hp) operating at a 0.62 load factor for 7 hours per day

1 Paving Equipment (104 hp) operating at a 0.53 load factor for 8 hours per day

1 Rollers (95 hp) operating at a 0.56 load factor for 7 hours per day

1 Tractors/Loaders/Backhoes (108 hp) operating at a 0.55 load factor for 7 hours per day

Phase: Building Construction 4/1/2012 - 10/22/2012 - Building Construction Description

Off-Road Equipment:

1 Cranes (399 hp) operating at a 0.43 load factor for 6 hours per day

2 Forklifts (145 hp) operating at a 0.3 load factor for 6 hours per day

1 Generator Sets (49 hp) operating at a 0.74 load factor for 8 hours per day

1 Tractors/Loaders/Backhoes (108 hp) operating at a 0.55 load factor for 8 hours per day

3 Welders (45 hp) operating at a 0.45 load factor for 8 hours per day

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Phase: Architectural Coating 10/23/2012 - 12/7/2012 - Architectural Coating Description

Rule: Residential Interior Coatings begins 1/1/2005 ends 12/31/2040 specifies a VOC of 250

Rule: Residential Exterior Coatings begins 1/1/2005 ends 12/31/2040 specifies a VOC of 250

Rule: Nonresidential Interior Coatings begins 1/1/2005 ends 12/31/2040 specifies a VOC of 250

Rule: Nonresidential Exterior Coatings begins 1/1/2005 ends 12/31/2040 specifies a VOC of 250

Construction Mitigated Detail Report:

CONSTRUCTION EMISSION ESTIMATES Summer Pounds Per Day, Mitigated

	<u>CO2</u>
Time Slice 2/2/2012-3/12/2012	2,349.22
Active Days: 28	
Mass Grading 02/02/2012-03/12/2012	2,349.22
Mass Grading Dust	0.00
Mass Grading Off Road Diesel	2,247.32
Mass Grading On Road Diesel	0.00
Mass Grading Worker Trips	101.91
Time Slice 3/13/2012-3/30/2012	1,689.83
Active Days: 14	
Asphalt 03/13/2012-04/01/2012	1,689.83
Paving Off-Gas	0.00
Paving Off Road Diesel	1,272.04
Paving On Road Diesel	213.98
Paving Worker Trips	203.81

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Time Slice 4/2/2012-10/22/2012	<u>3,402.34</u>
Active Days: 146	
Building 04/01/2012-10/22/2012	3,402.34
Building Off Road Diesel	1,621.20
Building Vendor Trips	353.48
Building Worker Trips	1,427.66
Time Slice 10/23/2012-12/7/2012	164.02
Active Days: 34	
Coating 10/23/2012-12/07/2012	164.02
Architectural Coating	0.00
Coating Worker Trips	164.02

Construction Related Mitigation Measures

The following mitigation measures apply to Phase: Mass Grading 2/2/2012 - 3/12/2012 - Mass Site Grading Description

For Soil Stabilizing Measures, the Water exposed surfaces 2x daily watering mitigation reduces emissions by:

PM10: 55% PM25: 55%

The following mitigation measures apply to Phase: Architectural Coating 10/23/2012 - 12/7/2012 - Architectural Coating Description

For Residential Architectural Coating Measures, the Residential Exterior: Use Low VOC Coatings mitigation reduces emissions by:

ROG: 10%

For Residential Architectural Coating Measures, the Residential Interior: Use Low VOC Coatings mitigation reduces emissions by:

ROG: 10%

For Nonresidential Architectural Coating Measures, the Nonresidential Exterior: Use Low VOC Coatings mitigation reduces emissions by:

ROG: 10%

For Nonresidential Architectural Coating Measures, the Nonresidential Interior: Use Low VOC Coatings mitigation reduces emissions by:

ROG: 10%

Urbemis 2007 Version 9.2.4

Combined Annual Emissions Reports (Tons/Year)

File Name: H:\AQ-GHG Models\Rincon del Rio\Construction Emissions - Phase 1 and 2 - Building Construction.urb924

Project Name: Rincon Del Rio - Phases 1 and 2 - Building Construction Model

Project Location: Mountain Counties Air Basin

On-Road Vehicle Emissions Based on: Version : Emfac2007 V2.3 Nov 1 2006

Off-Road Vehicle Emissions Based on: OFFROAD2007

Summary Report:

CONSTRUCTION EMISSION ESTIMATES

CO2

2012 TOTALS (tons/year unmitigated)	295.88
2012 TOTALS (tons/year mitigated)	295.88
Percent Reduction	0.00

Construction Unmitigated Detail Report:

CONSTRUCTION EMISSION ESTIMATES Annual Tons Per Year, Unmitigated

CO2

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2012	295.88
Mass Grading 02/02/2012-03/12/2012	32.89
Mass Grading Dust	0.00
Mass Grading Off Road Diesel	31.46
Mass Grading On Road Diesel	0.00
Mass Grading Worker Trips	1.43
Asphalt 03/13/2012-04/01/2012	11.83
Paving Off-Gas	0.00
Paving Off Road Diesel	8.90
Paving On Road Diesel	1.50
Paving Worker Trips	1.43
Building 04/01/2012-10/22/2012	248.37
Building Off Road Diesel	118.35
Building Vendor Trips	25.80
Building Worker Trips	104.22
Coating 10/23/2012-12/07/2012	2.79
Architectural Coating	0.00
Coating Worker Trips	2.79

Phase Assumptions

Phase: Mass Grading 2/2/2012 - 3/12/2012 - Mass Site Grading Description

Total Acres Disturbed: 10.05

Maximum Daily Acreage Disturbed: 2.51

Fugitive Dust Level of Detail: Default

20 lbs per acre-day

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On Road Truck Travel (VMT): 0

Off-Road Equipment:

- 1 Graders (174 hp) operating at a 0.61 load factor for 6 hours per day
- 1 Rubber Tired Dozers (357 hp) operating at a 0.59 load factor for 6 hours per day
- 1 Tractors/Loaders/Backhoes (108 hp) operating at a 0.55 load factor for 7 hours per day
- 1 Water Trucks (189 hp) operating at a 0.5 load factor for 8 hours per day

Phase: Paving 3/13/2012 - 4/1/2012 - Paving Description

Acres to be Paved: 2.51

Off-Road Equipment:

- 4 Cement and Mortar Mixers (10 hp) operating at a 0.56 load factor for 6 hours per day
- 1 Pavers (100 hp) operating at a 0.62 load factor for 7 hours per day
- 1 Paving Equipment (104 hp) operating at a 0.53 load factor for 8 hours per day
- 1 Rollers (95 hp) operating at a 0.56 load factor for 7 hours per day
- 1 Tractors/Loaders/Backhoes (108 hp) operating at a 0.55 load factor for 7 hours per day

Phase: Building Construction 4/1/2012 - 10/22/2012 - Building Construction Description

Off-Road Equipment:

- 1 Cranes (399 hp) operating at a 0.43 load factor for 6 hours per day
- 2 Forklifts (145 hp) operating at a 0.3 load factor for 6 hours per day
- 1 Generator Sets (49 hp) operating at a 0.74 load factor for 8 hours per day
- 1 Tractors/Loaders/Backhoes (108 hp) operating at a 0.55 load factor for 8 hours per day
- 3 Welders (45 hp) operating at a 0.45 load factor for 8 hours per day

Phase: Architectural Coating 10/23/2012 - 12/7/2012 - Architectural Coating Description

Rule: Residential Interior Coatings begins 1/1/2005 ends 12/31/2040 specifies a VOC of 250

Rule: Residential Exterior Coatings begins 1/1/2005 ends 12/31/2040 specifies a VOC of 250

Rule: Nonresidential Interior Coatings begins 1/1/2005 ends 12/31/2040 specifies a VOC of 250

Rule: Nonresidential Exterior Coatings begins 1/1/2005 ends 12/31/2040 specifies a VOC of 250

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Construction Mitigated Detail Report:

CONSTRUCTION EMISSION ESTIMATES Annual Tons Per Year, Mitigated

	<u>CO2</u>
2012	295.88
Mass Grading 02/02/2012-03/12/2012	32.89
Mass Grading Dust	0.00
Mass Grading Off Road Diesel	31.46
Mass Grading On Road Diesel	0.00
Mass Grading Worker Trips	1.43
Asphalt 03/13/2012-04/01/2012	11.83
Paving Off-Gas	0.00
Paving Off Road Diesel	8.90
Paving On Road Diesel	1.50
Paving Worker Trips	1.43
Building 04/01/2012-10/22/2012	248.37
Building Off Road Diesel	118.35
Building Vendor Trips	25.80
Building Worker Trips	104.22
Coating 10/23/2012-12/07/2012	2.79
Architectural Coating	0.00
Coating Worker Trips	2.79

Construction Related Mitigation Measures

The following mitigation measures apply to Phase: Mass Grading 2/2/2012 - 3/12/2012 - Mass Site Grading Description

For Soil Stabilizing Measures, the Water exposed surfaces 2x daily watering mitigation reduces emissions by:

PM10: 55% PM25: 55%

The following mitigation measures apply to Phase: Architectural Coating 10/23/2012 - 12/7/2012 - Architectural Coating Description

For Residential Architectural Coating Measures, the Residential Exterior: Use Low VOC Coatings mitigation reduces emissions by:

ROG: 10%

For Residential Architectural Coating Measures, the Residential Interior: Use Low VOC Coatings mitigation reduces emissions by:

ROG: 10%

For Nonresidential Architectural Coating Measures, the Nonresidential Exterior: Use Low VOC Coatings mitigation reduces emissions by:

ROG: 10%

For Nonresidential Architectural Coating Measures, the Nonresidential Interior: Use Low VOC Coatings mitigation reduces emissions by:

ROG: 10%

Urbemis 2007 Version 9.2.4

Combined Summer Emissions Reports (Pounds/Day)

File Name: H:\AQ-GHG Models\Rincon del Rio\Construction Emissions - Phase 1 and 2 - Road Construction.urb924

Project Name: Rincon Del Rio - Phases 1 and 2 - Road Construction Model

Project Location: Mountain Counties Air Basin

On-Road Vehicle Emissions Based on: Version : Emfac2007 V2.3 Nov 1 2006

Off-Road Vehicle Emissions Based on: OFFROAD2007

Summary Report:

CONSTRUCTION EMISSION ESTIMATES

CO2

2012 TOTALS (lbs/day unmitigated) 2,349.22

2012 TOTALS (lbs/day mitigated) 2,349.22

Construction Unmitigated Detail Report:

CONSTRUCTION EMISSION ESTIMATES Summer Pounds Per Day, Unmitigated

CO2

Time Slice 1/10/2012-2/10/2012 1,816.54

Active Days: 24

Trenching 01/10/2012-02/10/2012 1,816.54

Trenching Off Road Diesel 1,714.64

Trenching Worker Trips 101.91

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Time Slice 2/13/2012-3/9/2012 **2,349.22**
Active Days: 20

Mass Grading 02/11/2012-
03/11/2012 2,349.22

Mass Grading Dust 0.00

Mass Grading Off Road Diesel 2,247.32

Mass Grading On Road Diesel 0.00

Mass Grading Worker Trips 101.91

Time Slice 3/12/2012-4/30/2012 1,190.71
Active Days: 36

Asphalt 03/12/2012-04/30/2012 1,190.71

Paving Off-Gas 0.00

Paving Off Road Diesel 979.23

Paving On Road Diesel 33.15

Paving Worker Trips 178.34

Phase Assumptions

Phase: Mass Grading 2/11/2012 - 3/11/2012 - Grading

Total Acres Disturbed: 1.83

Maximum Daily Acreage Disturbed: 0.46

Fugitive Dust Level of Detail: Default

20 lbs per acre-day

On Road Truck Travel (VMT): 0

Off-Road Equipment:

1 Graders (174 hp) operating at a 0.61 load factor for 6 hours per day

1 Rubber Tired Dozers (357 hp) operating at a 0.59 load factor for 6 hours per day

1 Tractors/Loaders/Backhoes (108 hp) operating at a 0.55 load factor for 7 hours per day

1 Water Trucks (189 hp) operating at a 0.5 load factor for 8 hours per day

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Phase: Trenching 1/10/2012 - 2/10/2012 - Surface Preparation

Off-Road Equipment:

- 2 Excavators (168 hp) operating at a 0.57 load factor for 8 hours per day
- 1 Other General Industrial Equipment (238 hp) operating at a 0.51 load factor for 8 hours per day
- 1 Tractors/Loaders/Backhoes (108 hp) operating at a 0.55 load factor for 0 hours per day

Phase: Paving 3/12/2012 - 4/30/2012 - Paving

Acres to be Paved: 1

Off-Road Equipment:

- 4 Cement and Mortar Mixers (10 hp) operating at a 0.56 load factor for 6 hours per day
- 1 Pavers (100 hp) operating at a 0.62 load factor for 7 hours per day
- 1 Rollers (95 hp) operating at a 0.56 load factor for 7 hours per day
- 1 Tractors/Loaders/Backhoes (108 hp) operating at a 0.55 load factor for 7 hours per day

Construction Mitigated Detail Report:

CONSTRUCTION EMISSION ESTIMATES Summer Pounds Per Day, Mitigated

CO2

Time Slice 1/10/2012-2/10/2012	1,816.54
Active Days: 24	
Trenching 01/10/2012-02/10/2012	1,816.54
Trenching Off Road Diesel	1,714.64
Trenching Worker Trips	101.91

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Time Slice 2/13/2012-3/9/2012	<u>2,349.22</u>
Active Days: 20	
Mass Grading 02/11/2012-03/11/2012	2,349.22
Mass Grading Dust	0.00
Mass Grading Off Road Diesel	2,247.32
Mass Grading On Road Diesel	0.00
Mass Grading Worker Trips	101.91
Time Slice 3/12/2012-4/30/2012	1,190.71
Active Days: 36	
Asphalt 03/12/2012-04/30/2012	1,190.71
Paving Off-Gas	0.00
Paving Off Road Diesel	979.23
Paving On Road Diesel	33.15
Paving Worker Trips	178.34

Construction Related Mitigation Measures

The following mitigation measures apply to Phase: Mass Grading 2/11/2012 - 3/11/2012 - Grading

For Soil Stabilizing Measures, the Water exposed surfaces 2x daily watering mitigation reduces emissions by:

PM10: 55% PM25: 55%

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Urbemis 2007 Version 9.2.4

Combined Annual Emissions Reports (Tons/Year)

File Name: H:\AQ-GHG Models\Rincon del Rio\Construction Emissions - Phase 1 and 2 - Road Construction.urb924

Project Name: Rincon Del Rio - Phases 1 and 2 - Road Construction Model

Project Location: Mountain Counties Air Basin

On-Road Vehicle Emissions Based on: Version : Emfac2007 V2.3 Nov 1 2006

Off-Road Vehicle Emissions Based on: OFFROAD2007

Summary Report:

CONSTRUCTION EMISSION ESTIMATES

CO2

2012 TOTALS (tons/year unmitigated)	66.72
2012 TOTALS (tons/year mitigated)	66.72
Percent Reduction	0.00

Construction Unmitigated Detail Report:

CONSTRUCTION EMISSION ESTIMATES Annual Tons Per Year, Unmitigated

CO2

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2012	66.72
Trenching 01/10/2012-02/10/2012	21.80
Trenching Off Road Diesel	20.58
Trenching Worker Trips	1.22
Mass Grading 02/11/2012-03/11/2012	23.49
Mass Grading Dust	0.00
Mass Grading Off Road Diesel	22.47
Mass Grading On Road Diesel	0.00
Mass Grading Worker Trips	1.02
Asphalt 03/12/2012-04/30/2012	21.43
Paving Off-Gas	0.00
Paving Off Road Diesel	17.63
Paving On Road Diesel	0.60
Paving Worker Trips	3.21

Phase Assumptions

Phase: Mass Grading 2/11/2012 - 3/11/2012 - Grading

Total Acres Disturbed: 1.83

Maximum Daily Acreage Disturbed: 0.46

Fugitive Dust Level of Detail: Default

20 lbs per acre-day

On Road Truck Travel (VMT): 0

Off-Road Equipment:

1 Graders (174 hp) operating at a 0.61 load factor for 6 hours per day

1 Rubber Tired Dozers (357 hp) operating at a 0.59 load factor for 6 hours per day

1 Tractors/Loaders/Backhoes (108 hp) operating at a 0.55 load factor for 7 hours per day

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1 Water Trucks (189 hp) operating at a 0.5 load factor for 8 hours per day

Phase: Trenching 1/10/2012 - 2/10/2012 - Surface Preparation

Off-Road Equipment:

2 Excavators (168 hp) operating at a 0.57 load factor for 8 hours per day

1 Other General Industrial Equipment (238 hp) operating at a 0.51 load factor for 8 hours per day

1 Tractors/Loaders/Backhoes (108 hp) operating at a 0.55 load factor for 0 hours per day

Phase: Paving 3/12/2012 - 4/30/2012 - Paving

Acres to be Paved: 1

Off-Road Equipment:

4 Cement and Mortar Mixers (10 hp) operating at a 0.56 load factor for 6 hours per day

1 Pavers (100 hp) operating at a 0.62 load factor for 7 hours per day

1 Rollers (95 hp) operating at a 0.56 load factor for 7 hours per day

1 Tractors/Loaders/Backhoes (108 hp) operating at a 0.55 load factor for 7 hours per day

Construction Mitigated Detail Report:

CONSTRUCTION EMISSION ESTIMATES Annual Tons Per Year, Mitigated

CO2

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2012	66.72
Trenching 01/10/2012-02/10/2012	21.80
Trenching Off Road Diesel	20.58
Trenching Worker Trips	1.22
Mass Grading 02/11/2012-03/11/2012	23.49
Mass Grading Dust	0.00
Mass Grading Off Road Diesel	22.47
Mass Grading On Road Diesel	0.00
Mass Grading Worker Trips	1.02
Asphalt 03/12/2012-04/30/2012	21.43
Paving Off-Gas	0.00
Paving Off Road Diesel	17.63
Paving On Road Diesel	0.60
Paving Worker Trips	3.21

Construction Related Mitigation Measures

The following mitigation measures apply to Phase: Mass Grading 2/11/2012 - 3/11/2012 - Grading

For Soil Stabilizing Measures, the Water exposed surfaces 2x daily watering mitigation reduces emissions by:

PM10: 55% PM25: 55%

Urbemis 2007 Version 9.2.4

Combined Winter Emissions Reports (Pounds/Day)

File Name: H:\AQ-GHG Models\Rincon del Rio\Construction Emissions - Phase 3.urb924

Project Name: Rincon Del Rio - Construction Phase 3

Project Location: Mountain-Counties Air Basin

On-Road Vehicle Emissions Based on: Version : Emfac2007 V2.3 Nov 1 2006

Off-Road Vehicle Emissions Based on: OFFROAD2007

Summary Report:

CONSTRUCTION EMISSION ESTIMATES

CO2

2013 TOTALS (lbs/day unmitigated) 2,349.28

2013 TOTALS (lbs/day mitigated) 2,349.28

Construction Unmitigated Detail Report:

CONSTRUCTION EMISSION ESTIMATES Winter Pounds Per Day, Unmitigated

CO2

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Time Slice 1/15/2013-2/1/2013 **2,349.28**
Active Days: 14

Mass Grading 01/15/2013-02/01/2013 2,349.28

Mass Grading Dust 0.00

Mass Grading Off Road Diesel 2,247.32

Mass Grading On Road Diesel 0.00

Mass Grading Worker Trips 101.97

Time Slice 2/4/2013-2/14/2013 1,608.45
Active Days: 9

Asphalt 02/02/2013-02/14/2013 1,608.45

Paving Off-Gas 0.00

Paving Off Road Diesel 1,272.04

Paving On Road Diesel 132.48

Paving Worker Trips 203.93

Time Slice 2/15/2013-5/10/2013 2,267.26
Active Days: 61

Building 02/15/2013-05/10/2013 2,267.26

Building Off Road Diesel 1,621.20

Building Vendor Trips 128.17

Building Worker Trips 517.89

Time Slice 5/13/2013-6/11/2013 87.96
Active Days: 22

Coating 05/11/2013-06/11/2013 87.96

Architectural Coating 0.00

Coating Worker Trips 87.96

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Phase Assumptions

Phase: Mass Grading 1/15/2013 - 2/1/2013 - Fine Site Grading Description

Total Acres Disturbed: 4.43

Maximum Daily Acreage Disturbed: 1.11

Fugitive Dust Level of Detail: Default

20 lbs per acre-day

On Road Truck Travel (VMT): 0

Off-Road Equipment:

1 Graders (174 hp) operating at a 0.61 load factor for 6 hours per day

1 Rubber Tired Dozers (357 hp) operating at a 0.59 load factor for 6 hours per day

1 Tractors/Loaders/Backhoes (108 hp) operating at a 0.55 load factor for 7 hours per day

1 Water Trucks (189 hp) operating at a 0.5 load factor for 8 hours per day

Phase: Paving 2/2/2013 - 2/14/2013 - Paving Description

Acres to be Paved: 1.11

Off-Road Equipment:

4 Cement and Mortar Mixers (10 hp) operating at a 0.56 load factor for 6 hours per day

1 Pavers (100 hp) operating at a 0.62 load factor for 7 hours per day

1 Paving Equipment (104 hp) operating at a 0.53 load factor for 8 hours per day

1 Rollers (95 hp) operating at a 0.56 load factor for 7 hours per day

1 Tractors/Loaders/Backhoes (108 hp) operating at a 0.55 load factor for 7 hours per day

Phase: Building Construction 2/15/2013 - 5/10/2013 - Building Construction Description

Off-Road Equipment:

1 Cranes (399 hp) operating at a 0.43 load factor for 6 hours per day

2 Forklifts (145 hp) operating at a 0.3 load factor for 6 hours per day

1 Generator Sets (49 hp) operating at a 0.74 load factor for 8 hours per day

1 Tractors/Loaders/Backhoes (108 hp) operating at a 0.55 load factor for 8 hours per day

3 Welders (45 hp) operating at a 0.45 load factor for 8 hours per day

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Phase: Architectural Coating 5/11/2013 - 6/11/2013 - Architectural Coating Description

Rule: Residential Interior Coatings begins 1/1/2005 ends 12/31/2040 specifies a VOC of 250

Rule: Residential Exterior Coatings begins 1/1/2005 ends 12/31/2040 specifies a VOC of 250

Rule: Nonresidential Interior Coatings begins 1/1/2005 ends 12/31/2040 specifies a VOC of 250

Rule: Nonresidential Exterior Coatings begins 1/1/2005 ends 12/31/2040 specifies a VOC of 250

Construction Mitigated Detail Report:

CONSTRUCTION EMISSION ESTIMATES Winter Pounds Per Day, Mitigated

	<u>CO2</u>
Time Slice 1/15/2013-2/1/2013	<u>2,349.28</u>
Active Days: 14	
Mass Grading 01/15/2013-02/01/2013	2,349.28
Mass Grading Dust	0.00
Mass Grading Off Road Diesel	2,247.32
Mass Grading On Road Diesel	0.00
Mass Grading Worker Trips	101.97
Time Slice 2/4/2013-2/14/2013	1,608.45
Active Days: 9	
Asphalt 02/02/2013-02/14/2013	1,608.45
Paving Off-Gas	0.00
Paving Off Road Diesel	1,272.04
Paving On Road Diesel	132.48
Paving Worker Trips	203.93

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Time Slice 2/15/2013-5/10/2013	2,267.26
Active Days: 61	
Building 02/15/2013-05/10/2013	2,267.26
Building Off Road Diesel	1,621.20
Building Vendor Trips	128.17
Building Worker Trips	517.89
Time Slice 5/13/2013-6/11/2013	87.96
Active Days: 22	
Coating 05/11/2013-06/11/2013	87.96
Architectural Coating	0.00
Coating Worker Trips	87.96

Construction Related Mitigation Measures

The following mitigation measures apply to Phase: Mass Grading 1/15/2013 - 2/1/2013 - Fine Site Grading Description

For Soil Stabilizing Measures, the Water exposed surfaces 2x daily watering mitigation reduces emissions by:

PM10: 55% PM25: 55%

Urbemis 2007 Version 9.2.4

Combined Annual Emissions Reports (Tons/Year)

File Name: H:\AQ-GHG Models\Rincon del Rio\Construction Emissions - Phase 3.urb924.

Project Name: Rincon Del Rio - Construction Phase 3

Project Location: Mountain Counties Air Basin

On-Road Vehicle Emissions Based on: Version : Emfac2007 V2.3 Nov 1 2006

Off-Road Vehicle Emissions Based on: OFFROAD2007

Summary Report:

CONSTRUCTION EMISSION ESTIMATES

CO2

2013 TOTALS (tons/year unmitigated)	93.80
2013 TOTALS (tons/year mitigated)	93.80
Percent Reduction	0.00

Construction Unmitigated Detail Report:

CONSTRUCTION EMISSION ESTIMATES Annual Tons Per Year, Unmitigated

CO2

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2013	93.80
Mass Grading 01/15/2013-02/01/2013	16.44
Mass Grading Dust	0.00
Mass Grading Off Road Diesel	15.73
Mass Grading On Road Diesel	0.00
Mass Grading Worker Trips	0.71
Asphalt 02/02/2013-02/14/2013	7.24
Paving Off-Gas	0.00
Paving Off Road Diesel	5.72
Paving On Road Diesel	0.60
Paving Worker Trips	0.92
Building 02/15/2013-05/10/2013	69.15
Building Off Road Diesel	49.45
Building Vendor Trips	3.91
Building Worker Trips	15.80
Coating 05/11/2013-06/11/2013	0.97
Architectural Coating	0.00
Coating Worker Trips	0.97

Phase Assumptions

Phase: Mass Grading 1/15/2013 - 2/1/2013 - Fine Site Grading Description

Total Acres Disturbed: 4.43

Maximum Daily Acreage Disturbed: 1.11

Fugitive Dust Level of Detail: Default

20 lbs per acre-day

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On Road Truck Travel (VMT): 0

Off-Road Equipment:

- 1 Graders (174 hp) operating at a 0.61 load factor for 6 hours per day
- 1 Rubber Tired Dozers (357 hp) operating at a 0.59 load factor for 6 hours per day
- 1 Tractors/Loaders/Backhoes (108 hp) operating at a 0.55 load factor for 7 hours per day
- 1 Water Trucks (189 hp) operating at a 0.5 load factor for 8 hours per day

Phase: Paving 2/2/2013 - 2/14/2013 - Paving Description

Acres to be Paved: 1.11

Off-Road Equipment:

- 4 Cement and Mortar Mixers (10 hp) operating at a 0.56 load factor for 6 hours per day
- 1 Pavers (100 hp) operating at a 0.62 load factor for 7 hours per day
- 1 Paving Equipment (104 hp) operating at a 0.53 load factor for 8 hours per day
- 1 Rollers (95 hp) operating at a 0.56 load factor for 7 hours per day
- 1 Tractors/Loaders/Backhoes (108 hp) operating at a 0.55 load factor for 7 hours per day

Phase: Building Construction 2/15/2013 - 5/10/2013 - Building Construction Description

Off-Road Equipment:

- 1 Cranes (399 hp) operating at a 0.43 load factor for 6 hours per day
- 2 Forklifts (145 hp) operating at a 0.3 load factor for 6 hours per day
- 1 Generator Sets (49 hp) operating at a 0.74 load factor for 8 hours per day
- 1 Tractors/Loaders/Backhoes (108 hp) operating at a 0.55 load factor for 8 hours per day
- 3 Welders (45 hp) operating at a 0.45 load factor for 8 hours per day

Phase: Architectural Coating 5/11/2013 - 6/11/2013 - Architectural Coating Description

Rule: Residential Interior Coatings begins 1/1/2005 ends 12/31/2040 specifies a VOC of 250

Rule: Residential Exterior Coatings begins 1/1/2005 ends 12/31/2040 specifies a VOC of 250

Rule: Nonresidential Interior Coatings begins 1/1/2005 ends 12/31/2040 specifies a VOC of 250

Rule: Nonresidential Exterior Coatings begins 1/1/2005 ends 12/31/2040 specifies a VOC of 250

Construction Mitigated Detail Report:

CONSTRUCTION EMISSION ESTIMATES Annual Tons Per Year, Mitigated

	<u>CO2</u>
2013	93.80
Mass Grading 01/15/2013-02/01/2013	16.44
Mass Grading Dust	0.00
Mass Grading Off Road Diesel	15.73
Mass Grading On Road Diesel	0.00
Mass Grading Worker Trips	0.71
Asphalt 02/02/2013-02/14/2013	7.24
Paving Off-Gas	0.00
Paving Off Road Diesel	5.72
Paving On Road Diesel	0.60
Paving Worker Trips	0.92
Building 02/15/2013-05/10/2013	69.15
Building Off Road Diesel	49.45
Building Vendor Trips	3.91
Building Worker Trips	15.80
Coating 05/11/2013-06/11/2013	0.97
Architectural Coating	0.00
Coating Worker Trips	0.97

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Construction Related Mitigation Measures

The following mitigation measures apply to Phase: Mass Grading 1/15/2013 - 2/1/2013 - Fine Site Grading Description

For Soil Stabilizing Measures, the Water exposed surfaces 2x daily watering mitigation reduces emissions by:

PM10: 55% PM25: 55%

Urbemis 2007 Version 9.2.4

Combined Summer Emissions Reports (Pounds/Day)

File Name: H:\AQ-GHG Models\Rincon del Rio\Construction Emissions - Phase 4.urb924

Project Name: Rincon Del Rio - Construction Phase 4

Project Location: Mountain Counties Air Basin

On-Road Vehicle Emissions Based on: Version : Emfac2007 V2.3 Nov 1 2006

Off-Road Vehicle Emissions Based on: OFFROAD2007

Summary Report:

CONSTRUCTION EMISSION ESTIMATES

CO2

2013 TOTALS (lbs/day unmitigated) 2,349.28

2013 TOTALS (lbs/day mitigated) 2,349.28

Construction Unmitigated Detail Report:

CONSTRUCTION EMISSION ESTIMATES Summer Pounds Per Day, Unmitigated

CO2

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Time Slice 6/12/2013-6/28/2013 **2,349.28**
Active Days: 13

Mass Grading 06/12/2013-
06/30/2013 2,349.28

Mass Grading Dust 0.00

Mass Grading Off Road Diesel 2,247.32

Mass Grading On Road Diesel 0.00

Mass Grading Worker Trips 101.97

Time Slice 7/1/2013-7/12/2013 1,222.12
Active Days: 10

Asphalt 07/01/2013-07/14/2013 1,222.12

Paving Off-Gas 0.00

Paving Off Road Diesel 979.23

Paving On Road Diesel 64.45

Paving Worker Trips 178.44

Time Slice 7/15/2013-10/22/2013 1,141.61
Active Days: 72

Building 07/15/2013-10/22/2013 1,141.61

Building Off Road Diesel 893.39

Building Vendor Trips 49.24

Building Worker Trips 198.97

Time Slice 10/23/2013-11/29/2013 27.76
Active Days: 28

Coating 10/23/2013-12/01/2013 27.76

Architectural Coating 0.00

Coating Worker Trips 27.76

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Phase Assumptions

Phase: Mass Grading 6/12/2013 - 6/30/2013 - Mass Site Grading Description

Total Acres Disturbed: 2.18

Maximum Daily Acreage Disturbed: 0.54

Fugitive Dust Level of Detail: Default

20 lbs per acre-day

On Road Truck Travel (VMT): 0

Off-Road Equipment:

1 Graders (174 hp) operating at a 0.61 load factor for 6 hours per day

1 Rubber Tired Dozers (357 hp) operating at a 0.59 load factor for 6 hours per day

1 Tractors/Loaders/Backhoes (108 hp) operating at a 0.55 load factor for 7 hours per day

1 Water Trucks (189 hp) operating at a 0.5 load factor for 8 hours per day

Phase: Paving 7/1/2013 - 7/14/2013 - Paving Description

Acres to be Paved: 0.54

Off-Road Equipment:

4 Cement and Mortar Mixers (10 hp) operating at a 0.56 load factor for 6 hours per day

1 Pavers (100 hp) operating at a 0.62 load factor for 7 hours per day

1 Rollers (95 hp) operating at a 0.56 load factor for 7 hours per day

1 Tractors/Loaders/Backhoes (108 hp) operating at a 0.55 load factor for 7 hours per day

Phase: Building Construction 7/15/2013 - 10/22/2013 - Building Construction Description

Off-Road Equipment:

1 Cranes (399 hp) operating at a 0.43 load factor for 4 hours per day

2 Forklifts (145 hp) operating at a 0.3 load factor for 6 hours per day

1 Tractors/Loaders/Backhoes (108 hp) operating at a 0.55 load factor for 8 hours per day

Phase: Architectural Coating 10/23/2013 - 12/1/2013 - Architectural Coating Description

Rule: Residential Interior Coatings begins 1/1/2005 ends 12/31/2040 specifies a VOC of 250

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Rule: Residential Exterior Coatings begins 1/1/2005 ends 12/31/2040 specifies a VOC of 250

Rule: Nonresidential Interior Coatings begins 1/1/2005 ends 12/31/2040 specifies a VOC of 250

Rule: Nonresidential Exterior Coatings begins 1/1/2005 ends 12/31/2040 specifies a VOC of 250

Construction Mitigated Detail Report:

CONSTRUCTION EMISSION ESTIMATES Summer Pounds Per Day, Mitigated

	<u>CO2</u>
Time Slice 6/12/2013-6/28/2013	2,349.28
Active Days: 13	
Mass Grading 06/12/2013-06/30/2013	2,349.28
Mass Grading Dust	0.00
Mass Grading Off Road Diesel	2,247.32
Mass Grading On Road Diesel	0.00
Mass Grading Worker Trips	101.97
Time Slice 7/1/2013-7/12/2013	1,222.12
Active Days: 10	
Asphalt 07/01/2013-07/14/2013	1,222.12
Paving Off-Gas	0.00
Paving Off Road Diesel	979.23
Paving On Road Diesel	64.45
Paving Worker Trips	178.44

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Time Slice 7/15/2013-10/22/2013	1,141.61
Active Days: 72	
Building 07/15/2013-10/22/2013	1,141.61
Building Off Road Diesel	893.39
Building Vendor Trips	49.24
Building Worker Trips	198.97
Time Slice 10/23/2013-11/29/2013	27.76
Active Days: 28	
Coating 10/23/2013-12/01/2013	27.76
Architectural Coating	0.00
Coating Worker Trips	27.76

Construction Related Mitigation Measures

The following mitigation measures apply to Phase: Mass Grading 6/12/2013 - 6/30/2013 - Mass Site Grading Description

For Soil Stabilizing Measures, the Water exposed surfaces 2x daily watering mitigation reduces emissions by:

PM10: 55% PM25: 55%

Urbemis 2007 Version 9.2.4

Combined Annual Emissions Reports (Tons/Year)

File Name: H:\AQ-GHG Models\Rincon del Rio\Construction Emissions - Phase 4.urb924

Project Name: Rincon Del Rio - Construction Phase 4

Project Location: Mountain Counties Air Basin

On-Road Vehicle Emissions Based on: Version : Emfac2007 V2.3 Nov 1 2006

Off-Road Vehicle Emissions Based on: OFFROAD2007

Summary Report:

CONSTRUCTION EMISSION ESTIMATES

CO2

2013 TOTALS (tons/year unmitigated)	62.87
2013 TOTALS (tons/year mitigated)	62.87
Percent Reduction	0.00

Construction Unmitigated Detail Report:

CONSTRUCTION EMISSION ESTIMATES Annual Tons Per Year, Unmitigated

CO2

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2013	62.87
Mass Grading 06/12/2013-06/30/2013	15.27
Mass Grading Dust	0.00
Mass Grading Off Road Diesel	14.61
Mass Grading On Road Diesel	0.00
Mass Grading Worker Trips	0.66
Asphalt 07/01/2013-07/14/2013	6.11
Paving Off-Gas	0.00
Paving Off Road Diesel	4.90
Paving On Road Diesel	0.32
Paving Worker Trips	0.89
Building 07/15/2013-10/22/2013	41.10
Building Off Road Diesel	32.16
Building Vendor Trips	1.77
Building Worker Trips	7.16
Coating 10/23/2013-12/01/2013	0.39
Architectural Coating	0.00
Coating Worker Trips	0.39

Phase Assumptions

Phase: Mass Grading 6/12/2013 - 6/30/2013 - Mass Site Grading Description

Total Acres Disturbed: 2.18

Maximum Daily Acreage Disturbed: 0.54

Fugitive Dust Level of Detail: Default

20 lbs per acre-day

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On Road Truck Travel (VMT): 0

Off-Road Equipment:

- 1 Graders (174 hp) operating at a 0.61 load factor for 6 hours per day
- 1 Rubber Tired Dozers (357 hp) operating at a 0.59 load factor for 6 hours per day
- 1 Tractors/Loaders/Backhoes (108 hp) operating at a 0.55 load factor for 7 hours per day
- 1 Water Trucks (189 hp) operating at a 0.5 load factor for 8 hours per day

Phase: Paving 7/1/2013 - 7/14/2013 - Paving Description

Acres to be Paved: 0.54

Off-Road Equipment:

- 4 Cement and Mortar Mixers (10 hp) operating at a 0.56 load factor for 6 hours per day
- 1 Pavers (100 hp) operating at a 0.62 load factor for 7 hours per day
- 1 Rollers (95 hp) operating at a 0.56 load factor for 7 hours per day
- 1 Tractors/Loaders/Backhoes (108 hp) operating at a 0.55 load factor for 7 hours per day

Phase: Building Construction 7/15/2013 - 10/22/2013 - Building Construction Description

Off-Road Equipment:

- 1 Cranes (399 hp) operating at a 0.43 load factor for 4 hours per day
- 2 Forklifts (145 hp) operating at a 0.3 load factor for 6 hours per day
- 1 Tractors/Loaders/Backhoes (108 hp) operating at a 0.55 load factor for 8 hours per day

Phase: Architectural Coating 10/23/2013 - 12/1/2013 - Architectural Coating Description

Rule: Residential Interior Coatings begins 1/1/2005 ends 12/31/2040 specifies a VOC of 250

Rule: Residential Exterior Coatings begins 1/1/2005 ends 12/31/2040 specifies a VOC of 250

Rule: Nonresidential Interior Coatings begins 1/1/2005 ends 12/31/2040 specifies a VOC of 250

Rule: Nonresidential Exterior Coatings begins 1/1/2005 ends 12/31/2040 specifies a VOC of 250

Construction Mitigated Detail Report:

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CONSTRUCTION EMISSION ESTIMATES Annual Tons Per Year, Mitigated

	<u>CO2</u>
2013	62.87
Mass Grading 06/12/2013-06/30/2013	15.27
Mass Grading Dust	0.00
Mass Grading Off Road Diesel	14.61
Mass Grading On Road Diesel	0.00
Mass Grading Worker Trips	0.66
Asphalt 07/01/2013-07/14/2013	6.11
Paving Off-Gas	0.00
Paving Off Road Diesel	4.90
Paving On Road Diesel	0.32
Paving Worker Trips	0.89
Building 07/15/2013-10/22/2013	41.10
Building Off Road Diesel	32.16
Building Vendor Trips	1.77
Building Worker Trips	7.16
Coating 10/23/2013-12/01/2013	0.39
Architectural Coating	0.00
Coating Worker Trips	0.39

Construction Related Mitigation Measures

The following mitigation measures apply to Phase: Mass Grading 6/12/2013 - 6/30/2013 - Mass Site Grading Description
 For Soil Stabilizing Measures, the Water exposed surfaces 2x daily watering mitigation reduces emissions by:

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PM10: 55% PM25: 55%

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Urbemis 2007 Version 9.2.4

Combined Winter Emissions Reports (Pounds/Day)

File Name: H:\AQ-GHG Models\Rincon del Rio\Construction Emissions - Phase 5.urb924

Project Name: Rincon Del Rio - Construction Phase 5

Project Location: Mountain Counties Air Basin

On-Road Vehicle Emissions Based on: Version : Emfac2007 V2.3 Nov 1 2006

Off-Road Vehicle Emissions Based on: OFFROAD2007

Summary Report:

CONSTRUCTION EMISSION ESTIMATES

CO2

2014 TOTALS (lbs/day unmitigated) 2,349.34

2014 TOTALS (lbs/day mitigated) 2,349.34

Construction Unmitigated Detail Report:

CONSTRUCTION EMISSION ESTIMATES Winter Pounds Per Day, Unmitigated

CO2

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Time Slice 1/15/2014-1/31/2014 **2,349.34**
Active Days: 13

Mass Grading 01/15/2014-02/01/2014 2,349.34

Mass Grading Dust 0.00

Mass Grading Off Road Diesel 2,247.32

Mass Grading On Road Diesel 0.00

Mass Grading Worker Trips 102.03

Time Slice 2/3/2014-2/14/2014 1,254.34
Active Days: 10

Asphalt 02/02/2014-02/14/2014 1,254.34

Paving Off-Gas 0.00

Paving Off Road Diesel 979.23

Paving On Road Diesel 96.57

Paving Worker Trips 178.54

Time Slice 2/17/2014-5/9/2014 1,391.37
Active Days: 60

Building 02/15/2014-05/10/2014 1,391.37

Building Off Road Diesel 893.39

Building Vendor Trips 98.76

Building Worker Trips 399.22

Time Slice 5/12/2014-6/11/2014 64.98
Active Days: 23

Coating 05/11/2014-06/11/2014 64.98

Architectural Coating 0.00

Coating Worker Trips 64.98

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Phase Assumptions

Phase: Mass Grading 1/15/2014 - 2/1/2014 - Mass Site Grading Description

Total Acres Disturbed: 3.57

Maximum Daily Acreage Disturbed: 0.89

Fugitive Dust Level of Detail: Default

20 lbs per acre-day

On Road Truck Travel (VMT): 0

Off-Road Equipment:

1 Graders (174 hp) operating at a 0.61 load factor for 6 hours per day

1 Rubber Tired Dozers (357 hp) operating at a 0.59 load factor for 6 hours per day

1 Tractors/Loaders/Backhoes (108 hp) operating at a 0.55 load factor for 7 hours per day

1 Water Trucks (189 hp) operating at a 0.5 load factor for 8 hours per day

Phase: Paving 2/2/2014 - 2/14/2014 - Paving Description

Acres to be Paved: 0.89

Off-Road Equipment:

4 Cement and Mortar Mixers (10 hp) operating at a 0.56 load factor for 6 hours per day

1 Pavers (100 hp) operating at a 0.62 load factor for 7 hours per day

1 Rollers (95 hp) operating at a 0.56 load factor for 7 hours per day

1 Tractors/Loaders/Backhoes (108 hp) operating at a 0.55 load factor for 7 hours per day

Phase: Building Construction 2/15/2014 - 5/10/2014 - Building Construction Description

Off-Road Equipment:

1 Cranes (399 hp) operating at a 0.43 load factor for 4 hours per day

2 Forklifts (145 hp) operating at a 0.3 load factor for 6 hours per day

1 Tractors/Loaders/Backhoes (108 hp) operating at a 0.55 load factor for 8 hours per day

Phase: Architectural Coating 5/11/2014 - 6/11/2014 - Architectural Coating Description

Rule: Residential Interior Coatings begins 1/1/2005 ends 12/31/2040 specifies a VOC of 250

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Rule: Residential Exterior Coatings begins 1/1/2005 ends 12/31/2040 specifies a VOC of 250

Rule: Nonresidential Interior Coatings begins 1/1/2005 ends 12/31/2040 specifies a VOC of 250

Rule: Nonresidential Exterior Coatings begins 1/1/2005 ends 12/31/2040 specifies a VOC of 250

Construction Mitigated Detail Report:

CONSTRUCTION EMISSION ESTIMATES Winter Pounds Per Day, Mitigated

	<u>CO2</u>
Time Slice 1/15/2014-1/31/2014	2,349.34
Active Days: 13	
Mass Grading 01/15/2014-02/01/2014	2,349.34
Mass Grading Dust	0.00
Mass Grading Off Road Diesel	2,247.32
Mass Grading On Road Diesel	0.00
Mass Grading Worker Trips	102.03
Time Slice 2/3/2014-2/14/2014	1,254.34
Active Days: 10	
Asphalt 02/02/2014-02/14/2014	1,254.34
Paving Off-Gas	0.00
Paving Off Road Diesel	979.23
Paving On Road Diesel	96.57
Paving Worker Trips	178.54

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Time Slice 2/17/2014-5/9/2014	1,391.37
Active Days: 60	
Building 02/15/2014-05/10/2014	1,391.37
Building Off Road Diesel	893.39
Building Vendor Trips	98.76
Building Worker Trips	399.22
Time Slice 5/12/2014-6/11/2014	64.98
Active Days: 23	
Coating 05/11/2014-06/11/2014	64.98
Architectural Coating	0.00
Coating Worker Trips	64.98

Construction Related Mitigation Measures

The following mitigation measures apply to Phase: Mass Grading 1/15/2014 - 2/1/2014 - Mass Site Grading Description

For Soil Stabilizing Measures, the Water exposed surfaces 2x daily watering mitigation reduces emissions by:

PM10: 55% PM25: 55%

Urbemis 2007 Version 9.2.4

Combined Annual Emissions Reports (Tons/Year)

File Name: H:\AQ-GHG Models\Rincon del Rio\Construction Emissions - Phase 5.urb924

Project Name: Rincon Del Rio - Construction Phase 5

Project Location: Mountain Counties Air Basin

On-Road Vehicle Emissions Based on: Version : Emfac2007 V2.3 Nov 1 2006

Off-Road Vehicle Emissions Based on: OFFROAD2007

Summary Report:

CONSTRUCTION EMISSION ESTIMATES

CO2

2014 TOTALS (tons/year unmitigated)	64.03
2014 TOTALS (tons/year mitigated)	64.03
Percent Reduction	0.00

Construction Unmitigated Detail Report:

CONSTRUCTION EMISSION ESTIMATES Annual Tons Per Year, Unmitigated

CO2

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2014	64.03
Mass Grading 01/15/2014-02/01/2014	15.27
Mass Grading Dust	0.00
Mass Grading Off Road Diesel	14.61
Mass Grading On Road Diesel	0.00
Mass Grading Worker Trips	0.66
Asphalt 02/02/2014-02/14/2014	6.27
Paving Off-Gas	0.00
Paving Off Road Diesel	4.90
Paving On Road Diesel	0.48
Paving Worker Trips	0.89
Building 02/15/2014-05/10/2014	41.74
Building Off Road Diesel	26.80
Building Vendor Trips	2.96
Building Worker Trips	11.98
Coating 05/11/2014-06/11/2014	0.75
Architectural Coating	0.00
Coating Worker Trips	0.75

Phase Assumptions

Phase: Mass Grading 1/15/2014 - 2/1/2014 - Mass Site Grading Description

Total Acres Disturbed: 3.57

Maximum Daily Acreage Disturbed: 0.89

Fugitive Dust Level of Detail: Default

20 lbs per acre-day

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On Road Truck Travel (VMT): 0

Off-Road Equipment:

- 1 Graders (174 hp) operating at a 0.61 load factor for 6 hours per day
- 1 Rubber Tired Dozers (357 hp) operating at a 0.59 load factor for 6 hours per day
- 1 Tractors/Loaders/Backhoes (108 hp) operating at a 0.55 load factor for 7 hours per day
- 1 Water Trucks (189 hp) operating at a 0.5 load factor for 8 hours per day

Phase: Paving 2/2/2014 - 2/14/2014 - Paving Description

Acres to be Paved: 0.89

Off-Road Equipment:

- 4 Cement and Mortar Mixers (10 hp) operating at a 0.56 load factor for 6 hours per day
- 1 Pavers (100 hp) operating at a 0.62 load factor for 7 hours per day
- 1 Rollers (95 hp) operating at a 0.56 load factor for 7 hours per day
- 1 Tractors/Loaders/Backhoes (108 hp) operating at a 0.55 load factor for 7 hours per day

Phase: Building Construction 2/15/2014 - 5/10/2014 - Building Construction Description

Off-Road Equipment:

- 1 Cranes (399 hp) operating at a 0.43 load factor for 4 hours per day
- 2 Forklifts (145 hp) operating at a 0.3 load factor for 6 hours per day
- 1 Tractors/Loaders/Backhoes (108 hp) operating at a 0.55 load factor for 8 hours per day

Phase: Architectural Coating 5/11/2014 - 6/11/2014 - Architectural Coating Description

Rule: Residential Interior Coatings begins 1/1/2005 ends 12/31/2040 specifies a VOC of 250

Rule: Residential Exterior Coatings begins 1/1/2005 ends 12/31/2040 specifies a VOC of 250

Rule: Nonresidential Interior Coatings begins 1/1/2005 ends 12/31/2040 specifies a VOC of 250

Rule: Nonresidential Exterior Coatings begins 1/1/2005 ends 12/31/2040 specifies a VOC of 250

Construction Mitigated Detail Report:

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CONSTRUCTION EMISSION ESTIMATES Annual Tons Per Year, Mitigated

	<u>CO2</u>
2014	64.03
Mass Grading 01/15/2014-02/01/2014	15.27
Mass Grading Dust	0.00
Mass Grading Off Road Diesel	14.61
Mass Grading On Road Diesel	0.00
Mass Grading Worker Trips	0.66
Asphalt 02/02/2014-02/14/2014	6.27
Paving Off-Gas	0.00
Paving Off Road Diesel	4.90
Paving On Road Diesel	0.48
Paving Worker Trips	0.89
Building 02/15/2014-05/10/2014	41.74
Building Off Road Diesel	26.80
Building Vendor Trips	2.96
Building Worker Trips	11.98
Coating 05/11/2014-06/11/2014	0.75
Architectural Coating	0.00
Coating Worker Trips	0.75

Construction Related Mitigation Measures

The following mitigation measures apply to Phase: Mass Grading 1/15/2014 - 2/1/2014 - Mass Site Grading Description
 For Soil Stabilizing Measures, the Water exposed surfaces 2x daily watering mitigation reduces emissions by:

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PM10: 55% PM25: 55%

Urbemis 2007 Version 9.2.4

Combined Summer Emissions Reports (Pounds/Day)

File Name: H:\AQ-GHG Models\Rincon del Rio\Construction Emissions - Phase 6.urb924

Project Name: Rincon Del Rio - Construction Phase 6

Project Location: Mountain Counties Air Basin

On-Road Vehicle Emissions Based on: Version : Emfac2007 V2.3 Nov 1 2006

Off-Road Vehicle Emissions Based on: OFFROAD2007

Summary Report:

CONSTRUCTION EMISSION ESTIMATES

CO2

2014 TOTALS (lbs/day unmitigated) 2,349.34

2014 TOTALS (lbs/day mitigated) 2,349.34

Construction Unmitigated Detail Report:

CONSTRUCTION EMISSION ESTIMATES Summer Pounds Per Day, Unmitigated

CO2

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Time Slice 6/12/2014-6/30/2014 **2,349.34**
Active Days: 13

Mass Grading 06/12/2014-
06/30/2014 2,349.34

Mass Grading Dust 0.00

Mass Grading Off Road Diesel 2,247.32

Mass Grading On Road Diesel 0.00

Mass Grading Worker Trips 102.03

Time Slice 7/1/2014-7/11/2014 1,229.38
Active Days: 9

Asphalt 07/01/2014-07/13/2014 1,229.38

Paving Off-Gas 0.00

Paving Off Road Diesel 979.23

Paving On Road Diesel 71.61

Paving Worker Trips 178.54

Time Slice 7/14/2014-10/22/2014 1,103.69
Active Days: 73

Building 07/14/2014-10/22/2014 1,103.69

Building Off Road Diesel 893.39

Building Vendor Trips 41.71

Building Worker Trips 168.60

Time Slice 10/23/2014-12/1/2014 23.52
Active Days: 28

Coating 10/23/2014-12/01/2014 23.52

Architectural Coating 0.00

Coating Worker Trips 23.52

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Phase Assumptions

Phase: Mass Grading 6/12/2014 - 6/30/2014 - Mass Site Grading Description

Total Acres Disturbed: 2.14

Maximum Daily Acreage Disturbed: 0.54

Fugitive Dust Level of Detail: Default

20 lbs per acre-day

On Road Truck Travel (VMT): 0

Off-Road Equipment:

1 Graders (174 hp) operating at a 0.61 load factor for 6 hours per day

1 Rubber Tired Dozers (357 hp) operating at a 0.59 load factor for 6 hours per day

1 Tractors/Loaders/Backhoes (108 hp) operating at a 0.55 load factor for 7 hours per day

1 Water Trucks (189 hp) operating at a 0.5 load factor for 8 hours per day

Phase: Paving 7/1/2014 - 7/13/2014 - Paving Description

Acres to be Paved: 0.54

Off-Road Equipment:

4 Cement and Mortar Mixers (10 hp) operating at a 0.56 load factor for 6 hours per day

1 Pavers (100 hp) operating at a 0.62 load factor for 7 hours per day

1 Rollers (95 hp) operating at a 0.56 load factor for 7 hours per day

1 Tractors/Loaders/Backhoes (108 hp) operating at a 0.55 load factor for 7 hours per day

Phase: Building Construction 7/14/2014 - 10/22/2014 - Building Construction Description

Off-Road Equipment:

1 Cranes (399 hp) operating at a 0.43 load factor for 4 hours per day

2 Forklifts (145 hp) operating at a 0.3 load factor for 6 hours per day

1 Tractors/Loaders/Backhoes (108 hp) operating at a 0.55 load factor for 8 hours per day

Phase: Architectural Coating 10/23/2014 - 12/1/2014 - Architectural Coating Description

Rule: Residential Interior Coatings begins 1/1/2005 ends 12/31/2040 specifies a VOC of 250

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Rule: Residential Exterior Coatings begins 1/1/2005 ends 12/31/2040 specifies a VOC of 250

Rule: Nonresidential Interior Coatings begins 1/1/2005 ends 12/31/2040 specifies a VOC of 250

Rule: Nonresidential Exterior Coatings begins 1/1/2005 ends 12/31/2040 specifies a VOC of 250

Construction Mitigated Detail Report:

CONSTRUCTION EMISSION ESTIMATES Summer Pounds Per Day, Mitigated

CO2

Time Slice 6/12/2014-6/30/2014	<u>2,349.34</u>
Active Days: 13	
Mass Grading 06/12/2014-06/30/2014	2,349.34
Mass Grading Dust	0.00
Mass Grading Off Road Diesel	2,247.32
Mass Grading On Road Diesel	0.00
Mass Grading Worker Trips	102.03
Time Slice 7/1/2014-7/11/2014	1,229.38
Active Days: 9	
Asphalt 07/01/2014-07/13/2014	1,229.38
Paving Off-Gas	0.00
Paving Off Road Diesel	979.23
Paving On Road Diesel	71.61
Paving Worker Trips	178.54

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Time Slice 7/14/2014-10/22/2014 1,103.69
Active Days: 73

 Building 07/14/2014-10/22/2014 1,103.69

 Building Off Road Diesel 893.39

 Building Vendor Trips 41.71

 Building Worker Trips 168.60

Time Slice 10/23/2014-12/1/2014 23.52
Active Days: 28

 Coating 10/23/2014-12/01/2014 23.52

 Architectural Coating 0.00

 Coating Worker Trips 23.52

Construction Related Mitigation Measures

The following mitigation measures apply to Phase: Mass Grading 6/12/2014 - 6/30/2014 - Mass Site Grading Description

For Soil Stabilizing Measures, the Water exposed surfaces 2x daily watering mitigation reduces emissions by:

PM10: 55% PM25: 55%

Urbemis 2007 Version 9.2.4

Combined Annual Emissions Reports (Tons/Year)

File Name: H:\AQ-GHG Models\Rincon del Rio\Construction Emissions - Phase 6.urb924

Project Name: Rincon Del Rio - Construction Phase 6

Project Location: Mountain Counties Air Basin

On-Road Vehicle Emissions Based on: Version : Emfac2007 V2.3 Nov 1 2006

Off-Road Vehicle Emissions Based on: OFFROAD2007

Summary Report:

CONSTRUCTION EMISSION ESTIMATES

CO2

2014 TOTALS (tons/year unmitigated)	61.42
2014 TOTALS (tons/year mitigated)	61.42
Percent Reduction	0.00

Construction Unmitigated Detail Report:

CONSTRUCTION EMISSION ESTIMATES Annual Tons Per Year, Unmitigated

CO2

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2014	61.42
Mass Grading 06/12/2014-06/30/2014	15.27
Mass Grading Dust	0.00
Mass Grading Off Road Diesel	14.61
Mass Grading On Road Diesel	0.00
Mass Grading Worker Trips	0.66
Asphalt 07/01/2014-07/13/2014	5.53
Paving Off-Gas	0.00
Paving Off Road Diesel	4.41
Paving On Road Diesel	0.32
Paving Worker Trips	0.80
Building 07/14/2014-10/22/2014	40.28
Building Off Road Diesel	32.61
Building Vendor Trips	1.52
Building Worker Trips	6.15
Coating 10/23/2014-12/01/2014	0.33
Architectural Coating	0.00
Coating Worker Trips	0.33

Phase Assumptions

Phase: Mass Grading 6/12/2014 - 6/30/2014 - Mass Site Grading Description

Total Acres Disturbed: 2.14

Maximum Daily Acreage Disturbed: 0.54

Fugitive Dust Level of Detail: Default

20 lbs per acre-day

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On Road Truck Travel (VMT): 0

Off-Road Equipment:

- 1 Graders (174 hp) operating at a 0.61 load factor for 6 hours per day
- 1 Rubber Tired Dozers (357 hp) operating at a 0.59 load factor for 6 hours per day
- 1 Tractors/Loaders/Backhoes (108 hp) operating at a 0.55 load factor for 7 hours per day
- 1 Water Trucks (189 hp) operating at a 0.5 load factor for 8 hours per day

Phase: Paving 7/1/2014 - 7/13/2014 - Paving Description

Acres to be Paved: 0.54

Off-Road Equipment:

- 4 Cement and Mortar Mixers (10 hp) operating at a 0.56 load factor for 6 hours per day
- 1 Pavers (100 hp) operating at a 0.62 load factor for 7 hours per day
- 1 Rollers (95 hp) operating at a 0.56 load factor for 7 hours per day
- 1 Tractors/Loaders/Backhoes (108 hp) operating at a 0.55 load factor for 7 hours per day

Phase: Building Construction 7/14/2014 - 10/22/2014 - Building Construction Description

Off-Road Equipment:

- 1 Cranes (399 hp) operating at a 0.43 load factor for 4 hours per day
- 2 Forklifts (145 hp) operating at a 0.3-load factor for 6 hours per day
- 1 Tractors/Loaders/Backhoes (108 hp) operating at a 0.55 load factor for 8 hours per day

Phase: Architectural Coating 10/23/2014 - 12/1/2014 - Architectural Coating Description

Rule: Residential Interior Coatings begins 1/1/2005 ends 12/31/2040 specifies a VOC of 250

Rule: Residential Exterior Coatings begins 1/1/2005 ends 12/31/2040 specifies a VOC of 250

Rule: Nonresidential Interior Coatings begins 1/1/2005 ends 12/31/2040 specifies a VOC of 250

Rule: Nonresidential Exterior Coatings begins 1/1/2005 ends 12/31/2040 specifies a VOC of 250

Construction Mitigated Detail Report:

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CONSTRUCTION EMISSION ESTIMATES Annual Tons Per Year, Mitigated

	<u>CO2</u>
2014	61.42
Mass Grading 06/12/2014-06/30/2014	15.27
Mass Grading Dust	0.00
Mass Grading Off Road Diesel	14.61
Mass Grading On Road Diesel	0.00
Mass Grading Worker Trips	0.66
Asphalt 07/01/2014-07/13/2014	5.53
Paving Off-Gas	0.00
Paving Off Road Diesel	4.41
Paving On Road Diesel	0.32
Paving Worker Trips	0.80
Building 07/14/2014-10/22/2014	40.28
Building Off Road Diesel	32.61
Building Vendor Trips	1.52
Building Worker Trips	6.15
Coating 10/23/2014-12/01/2014	0.33
Architectural Coating	0.00
Coating Worker Trips	0.33

Construction Related Mitigation Measures

The following mitigation measures apply to Phase: Mass Grading 6/12/2014 - 6/30/2014 - Mass Site Grading Description
For Soil Stabilizing Measures, the Water exposed surfaces 2x daily watering mitigation reduces emissions by:

Page: 5

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PM10: 55% PM25: 55%

Urbemis 2007 Version 9.2.4

Combined Winter Emissions Reports (Pounds/Day)

File Name: H:\AQ-GHG Models\Rincon del Rio\Construction Emissions - Phase 7.urb924

Project Name: Rincon Del Rio - Construction Emissions Phase 7

Project Location: Mountain Counties Air Basin

On-Road Vehicle Emissions Based on: Version : Emfac2007 V2.3 Nov 1 2006

Off-Road Vehicle Emissions Based on: OFFROAD2007

Summary Report:

CONSTRUCTION EMISSION ESTIMATES

CO2

2015 TOTALS (lbs/day unmitigated) 2,349.40

2015 TOTALS (lbs/day mitigated) 2,349.40

Construction Unmitigated Detail Report:

CONSTRUCTION EMISSION ESTIMATES Winter Pounds Per Day, Unmitigated

CO2

1/17/2012 11:15:50 AM

Time Slice 1/15/2015-1/30/2015 **2,349.40**
Active Days: 12

Mass Grading 01/15/2015-
02/01/2015 2,349.40

Mass Grading Dust 0.00

Mass Grading Off Road Diesel 2,247.32

Mass Grading On Road Diesel 0.00

Mass Grading Worker Trips 102.08

Time Slice 2/2/2015-2/13/2015 1,207.99
Active Days: 10

Asphalt 02/02/2015-02/14/2015 1,207.99

Paving Off-Gas 0.00

Paving Off Road Diesel 979.23

Paving On Road Diesel 50.13

Paving Worker Trips 178.64

Time Slice 2/16/2015-4/21/2015 1,057.66
Active Days: 47

Building 02/15/2015-04/22/2015 1,057.66

Building Off Road Diesel 893.39

Building Vendor Trips 32.57

Building Worker Trips 131.70

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Time Slice 4/22/2015-4/22/2015	1,080.03
Active Days: 1	
Building 02/15/2015-04/22/2015	1,057.66
Building Off Road Diesel	893.39
Building Vendor Trips	32.57
Building Worker Trips	131.70
Coating 04/22/2015-05/22/2015	22.37
Architectural Coating	0.00
Coating Worker Trips	22.37
Time Slice 4/23/2015-5/22/2015	22.37
Active Days: 22	
Coating 04/22/2015-05/22/2015	22.37
Architectural Coating	0.00
Coating Worker Trips	22.37

Phase Assumptions

Phase: Mass Grading 1/15/2015 - 2/1/2015 - Mass Site Grading Description

Total Acres Disturbed: 1.68

Maximum Daily Acreage Disturbed: 0.42

Fugitive Dust Level of Detail: Default

20 lbs per acre-day

On Road Truck Travel (VMT): 0

Off-Road Equipment:

1 Graders (174 hp) operating at a 0.61 load factor for 6 hours per day

1 Rubber Tired Dozers (357 hp) operating at a 0.59 load factor for 6 hours per day

1 Tractors/Loaders/Backhoes (108 hp) operating at a 0.55 load factor for 7 hours per day

1 Water Trucks (189 hp) operating at a 0.5 load factor for 8 hours per day

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Phase: Paving 2/2/2015 - 2/14/2015 - Paving Description

Acres to be Paved: 0.42

Off-Road Equipment:

- 4 Cement and Mortar Mixers (10 hp) operating at a 0.56 load factor for 6 hours per day
- 1 Pavers (100 hp) operating at a 0.62 load factor for 7 hours per day
- 1 Rollers (95 hp) operating at a 0.56 load factor for 7 hours per day
- 1 Tractors/Loaders/Backhoes (108 hp) operating at a 0.55 load factor for 7 hours per day

Phase: Building Construction 2/15/2015 - 4/22/2015 - Building Construction Description

Off-Road Equipment:

- 1 Cranes (399 hp) operating at a 0.43 load factor for 4 hours per day
- 2 Forklifts (145 hp) operating at a 0.3 load factor for 6 hours per day
- 1 Tractors/Loaders/Backhoes (108 hp) operating at a 0.55 load factor for 8 hours per day

Phase: Architectural Coating 4/22/2015 - 5/22/2015 - Architectural Coating Description

Rule: Residential Interior Coatings begins 1/1/2005 ends 12/31/2040 specifies a VOC of 250

Rule: Residential Exterior Coatings begins 1/1/2005 ends 12/31/2040 specifies a VOC of 250

Rule: Nonresidential Interior Coatings begins 1/1/2005 ends 12/31/2040 specifies a VOC of 250

Rule: Nonresidential Exterior Coatings begins 1/1/2005 ends 12/31/2040 specifies a VOC of 250

Construction Mitigated Detail Report:

CONSTRUCTION EMISSION ESTIMATES Winter Pounds Per Day, Mitigated

CO2

1/17/2012 11:15:50 AM

Time Slice 1/15/2015-1/30/2015 **2,349.40**
Active Days: 12

Mass Grading 01/15/2015-02/01/2015 2,349.40

Mass Grading Dust 0.00

Mass Grading Off Road Diesel 2,247.32

Mass Grading On Road Diesel 0.00

Mass Grading Worker Trips 102.08

Time Slice 2/2/2015-2/13/2015 1,207.99
Active Days: 10

Asphalt 02/02/2015-02/14/2015 1,207.99

Paving Off-Gas 0.00

Paving Off Road Diesel 979.23

Paving On Road Diesel 50.13

Paving Worker Trips 178.64

Time Slice 2/16/2015-4/21/2015 1,057.66
Active Days: 47

Building 02/15/2015-04/22/2015 1,057.66

Building Off Road Diesel 893.39

Building Vendor Trips 32.57

Building Worker Trips 131.70

1/17/2012 11:15:50 AM

Time Slice 4/22/2015-4/22/2015	1,080.03
Active Days: 1	
Building 02/15/2015-04/22/2015	1,057.66
Building Off Road Diesel	893.39
Building Vendor Trips	32.57
Building Worker Trips	131.70
Coating 04/22/2015-05/22/2015	22.37
Architectural Coating	0.00
Coating Worker Trips	22.37
Time Slice 4/23/2015-5/22/2015	22.37
Active Days: 22	
Coating 04/22/2015-05/22/2015	22.37
Architectural Coating	0.00
Coating Worker Trips	22.37

Construction Related Mitigation Measures

The following mitigation measures apply to Phase: Mass Grading 1/15/2015 - 2/1/2015 - Mass Site Grading Description

For Soil Stabilizing Measures, the Water exposed surfaces 2x daily watering mitigation reduces emissions by:

PM10: 55% PM25: 55%

Urbemis 2007 Version 9.2.4

Combined Annual Emissions Reports (Tons/Year)

File Name: H:\AQ-GHG Models\Rincon del Rio\Construction Emissions - Phase 7.urb924

Project Name: Rincon Del Rio - Construction Emissions Phase 7

Project Location: Mountain Counties Air Basin

On-Road Vehicle Emissions Based on: Version : Emfac2007 V2.3 Nov 1 2006

Off-Road Vehicle Emissions Based on: OFFROAD2007

Summary Report:

CONSTRUCTION EMISSION ESTIMATES

	<u>CO2</u>
2015 TOTALS (tons/year unmitigated)	45.78
2015 TOTALS (tons/year mitigated)	45.78
Percent Reduction	0.00

Construction Mitigated Detail Report:

CONSTRUCTION EMISSION ESTIMATES Annual Tons Per Year, Mitigated

CO2

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2015	45.78
Mass Grading 01/15/2015-02/01/2015	14.10
Mass Grading Dust	0.00
Mass Grading Off Road Diesel	13.48
Mass Grading On Road Diesel	0.00
Mass Grading Worker Trips	0.61
Asphalt 02/02/2015-02/14/2015	6.04
Paving Off-Gas	0.00
Paving Off Road Diesel	4.90
Paving On Road Diesel	0.25
Paving Worker Trips	0.89
Building 02/15/2015-04/22/2015	25.38
Building Off Road Diesel	21.44
Building Vendor Trips	0.78
Building Worker Trips	3.16
Coating 04/22/2015-05/22/2015	0.26
Architectural Coating	0.00
Coating Worker Trips	0.26

Construction Related Mitigation Measures

The following mitigation measures apply to Phase: Mass Grading 1/15/2015 - 2/1/2015 - Mass Site Grading Description

For Soil Stabilizing Measures, the Water exposed surfaces 2x daily watering mitigation reduces emissions by:

PM10: 55% PM25: 55%

Urbemis 2007 Version 9.2.4

Combined Summer Emissions Reports (Pounds/Day)

File Name: H:\AQ-GHG Models\Rincon del Rio\Construction Emissions - Phase 8.urb924

Project Name: Rincon Del Rio - Construction Phase 8

Project Location: Mountain Counties Air Basin

On-Road Vehicle Emissions Based on: Version : Emfac2007 V2.3 Nov 1 2006

Off-Road Vehicle Emissions Based on: OFFROAD2007

Summary Report:

CONSTRUCTION EMISSION ESTIMATES

CO2

2015 TOTALS (lbs/day unmitigated) 3,952.28

2015 TOTALS (lbs/day mitigated) 3,952.28

Construction Unmitigated Detail Report:

CONSTRUCTION EMISSION ESTIMATES Summer Pounds Per Day, Unmitigated

CO2

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Time Slice 6/1/2015-6/15/2015 2,349.40
Active Days: 11

Mass Grading 06/01/2015-06/16/2015 2,349.40

Mass Grading Dust 0.00

Mass Grading Off Road Diesel 2,247.32

Mass Grading On Road Diesel 0.00

Mass Grading Worker Trips 102.08

Time Slice 6/16/2015-6/16/2015 **3,952.28**
Active Days: 1

Asphalt 06/16/2015-07/02/2015 1,602.89

Paving Off-Gas 0.00

Paving Off Road Diesel 1,272.04

Paving On Road Diesel 126.70

Paving Worker Trips 204.16

Mass Grading 06/01/2015-06/16/2015 2,349.40

Mass Grading Dust 0.00

Mass Grading Off Road Diesel 2,247.32

Mass Grading On Road Diesel 0.00

Mass Grading Worker Trips 102.08

1/17/2012 11:20:15 AM

Time Slice 6/17/2015-7/2/2015	1,602.89
Active Days: 12	
Asphalt 06/16/2015-07/02/2015	1,602.89
Paving Off-Gas	0.00
Paving Off Road Diesel	1,272.04
Paving On Road Diesel	126.70
Paving Worker Trips	204.16
Time Slice 7/3/2015-10/22/2015	2,464.98
Active Days: 80	
Building 07/03/2015-10/22/2015	2,464.98
Building Off Road Diesel	1,621.20
Building Vendor Trips	167.29
Building Worker Trips	676.49
Time Slice 10/23/2015-12/1/2015	94.38
Active Days: 28	
Coating 10/23/2015-12/01/2015	94.38
Architectural Coating	0.00
Coating Worker Trips	94.38

Phase Assumptions

Phase: Mass Grading 6/1/2015 - 6/16/2015 - Mass Site Grading Description

Total Acres Disturbed: 5.51

Maximum Daily Acreage Disturbed: 1.38

Fugitive Dust Level of Detail: Default

20 lbs per acre-day

On Road Truck Travel (VMT): 0

Off-Road Equipment:

1 Graders (174 hp) operating at a 0.61 load factor for 6 hours per day

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- 1 Rubber Tired Dozers (357 hp) operating at a 0.59 load factor for 6 hours per day
- 1 Tractors/Loaders/Backhoes (108 hp) operating at a 0.55 load factor for 7 hours per day
- 1 Water Trucks (189 hp) operating at a 0.5 load factor for 8 hours per day

Phase: Paving 6/16/2015 - 7/2/2015 - Paving Description

Acres to be Paved: 1.38

Off-Road Equipment:

- 4 Cement and Mortar Mixers (10 hp) operating at a 0.56 load factor for 6 hours per day
- 1 Pavers (100 hp) operating at a 0.62 load factor for 7 hours per day
- 1 Paving Equipment (104 hp) operating at a 0.53 load factor for 8 hours per day
- 1 Rollers (95 hp) operating at a 0.56 load factor for 7 hours per day
- 1 Tractors/Loaders/Backhoes (108 hp) operating at a 0.55 load factor for 7 hours per day

Phase: Building Construction 7/3/2015 - 10/22/2015 - Building Construction Description

Off-Road Equipment:

- 1 Cranes (399 hp) operating at a 0.43 load factor for 6 hours per day
- 2 Forklifts (145 hp) operating at a 0.3 load factor for 6 hours per day
- 1 Generator Sets (49 hp) operating at a 0.74 load factor for 8 hours per day
- 1 Tractors/Loaders/Backhoes (108 hp) operating at a 0.55 load factor for 8 hours per day
- 3 Welders (45 hp) operating at a 0.45 load factor for 8 hours per day

Phase: Architectural Coating 10/23/2015 - 12/1/2015 - Architectural Coating Description

Rule: Residential Interior Coatings begins 1/1/2005 ends 12/31/2040 specifies a VOC of 250

Rule: Residential Exterior Coatings begins 1/1/2005 ends 12/31/2040 specifies a VOC of 250

Rule: Nonresidential Interior Coatings begins 1/1/2005 ends 12/31/2040 specifies a VOC of 250

Rule: Nonresidential Exterior Coatings begins 1/1/2005 ends 12/31/2040 specifies a VOC of 250

Construction Mitigated Detail Report:

1/17/2012 11:20:15 AM

CONSTRUCTION EMISSION ESTIMATES Summer Pounds Per Day, Mitigated

	<u>CO2</u>
Time Slice 6/1/2015-6/15/2015	2,349.40
Active Days: 11	
Mass Grading 06/01/2015-06/16/2015	2,349.40
Mass Grading Dust	0.00
Mass Grading Off Road Diesel	2,247.32
Mass Grading On Road Diesel	0.00
Mass Grading Worker Trips	102.08
Time Slice 6/16/2015-6/16/2015	<u>3,952.28</u>
Active Days: 1	
Asphalt 06/16/2015-07/02/2015	1,602.89
Paving Off-Gas	0.00
Paving Off Road Diesel	1,272.04
Paving On Road Diesel	126.70
Paving Worker Trips	204.16
Mass Grading 06/01/2015-06/16/2015	2,349.40
Mass Grading Dust	0.00
Mass Grading Off Road Diesel	2,247.32
Mass Grading On Road Diesel	0.00
Mass Grading Worker Trips	102.08

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1/17/2012 11:20:15 AM

Time Slice 6/17/2015-7/2/2015	1,602.89
Active Days: 12	
Asphalt 06/16/2015-07/02/2015	1,602.89
Paving Off-Gas	0.00
Paving Off Road Diesel	1,272.04
Paving On Road Diesel	126.70
Paving Worker Trips	204.16
Time Slice 7/3/2015-10/22/2015	2,464.98
Active Days: 80	
Building 07/03/2015-10/22/2015	2,464.98
Building Off Road Diesel	1,621.20
Building Vendor Trips	167.29
Building Worker Trips	676.49
Time Slice 10/23/2015-12/1/2015	94.38
Active Days: 28	
Coating 10/23/2015-12/01/2015	94.38
Architectural Coating	0.00
Coating Worker Trips	94.38

Construction Related Mitigation Measures

The following mitigation measures apply to Phase: Mass Grading 6/1/2015 - 6/16/2015 - Mass Site Grading Description

For Soil Stabilizing Measures, the Water exposed surfaces 2x daily watering mitigation reduces emissions by:

PM10: 55% PM25: 55%

Urbemis 2007 Version 9.2.4

Combined Annual Emissions Reports (Tons/Year)

File Name: H:\AQ-GHG Models\Rincon del Rio\Construction Emissions - Phase 8.urb924

Project Name: Rincon Del Rio - Construction Phase 8

Project Location: Mountain Counties Air Basin

On-Road Vehicle Emissions Based on: Version : Emfac2007 V2.3 Nov 1 2006

Off-Road Vehicle Emissions Based on: OFFROAD2007

Summary Report:

CONSTRUCTION EMISSION ESTIMATES

CO2

2015 TOTALS (tons/year unmitigated)	124.44
2015 TOTALS (tons/year mitigated)	124.44
Percent Reduction	0.00

Construction Unmitigated Detail Report:

CONSTRUCTION EMISSION ESTIMATES Annual Tons Per Year, Unmitigated

CO2

1/17/2012 11:20:30 AM

2015	124.44
Mass Grading 06/01/2015-06/16/2015	14.10
Mass Grading Dust	0.00
Mass Grading Off Road Diesel	13.48
Mass Grading On Road Diesel	0.00
Mass Grading Worker Trips	0.61
Asphalt 06/16/2015-07/02/2015	10.42
Paving Off-Gas	0.00
Paving Off Road Diesel	8.27
Paving On Road Diesel	0.82
Paving Worker Trips	1.33
Building 07/03/2015-10/22/2015	98.60
Building Off Road Diesel	64.85
Building Vendor Trips	6.69
Building Worker Trips	27.06
Coating 10/23/2015-12/01/2015	1.32
Architectural Coating	0.00
Coating Worker Trips	1.32

Phase Assumptions

Phase: Mass Grading 6/1/2015 - 6/16/2015 - Mass Site Grading Description

Total Acres Disturbed: 5.51

Maximum Daily Acreage Disturbed: 1.38

Fugitive Dust Level of Detail: Default

20 lbs per acre-day

Page: 3

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On Road Truck Travel (VMT): 0

Off-Road Equipment:

- 1 Graders (174 hp) operating at a 0.61 load factor for 6 hours per day
- 1 Rubber Tired Dozers (357 hp) operating at a 0.59 load factor for 6 hours per day
- 1 Tractors/Loaders/Backhoes (108 hp) operating at a 0.55 load factor for 7 hours per day
- 1 Water Trucks (189 hp) operating at a 0.5 load factor for 8 hours per day

Phase: Paving 6/16/2015 - 7/2/2015 - Paving Description

Acres to be Paved: 1.38

Off-Road Equipment:

- 4 Cement and Mortar Mixers (10 hp) operating at a 0.56 load factor for 6 hours per day
- 1 Pavers (100 hp) operating at a 0.62 load factor for 7 hours per day
- 1 Paving Equipment (104 hp) operating at a 0.53 load factor for 8 hours per day
- 1 Rollers (95 hp) operating at a 0.56 load factor for 7 hours per day
- 1 Tractors/Loaders/Backhoes (108 hp) operating at a 0.55 load factor for 7 hours per day

Phase: Building Construction 7/3/2015 - 10/22/2015 - Building Construction Description

Off-Road Equipment:

- 1 Cranes (399 hp) operating at a 0.43 load factor for 6 hours per day
- 2 Forklifts (145 hp) operating at a 0.3 load factor for 6 hours per day
- 1 Generator Sets (49 hp) operating at a 0.74 load factor for 8 hours per day
- 1 Tractors/Loaders/Backhoes (108 hp) operating at a 0.55 load factor for 8 hours per day
- 3 Welders (45 hp) operating at a 0.45 load factor for 8 hours per day

Phase: Architectural Coating 10/23/2015 - 12/1/2015 - Architectural Coating Description

Rule: Residential Interior Coatings begins 1/1/2005 ends 12/31/2040 specifies a VOC of 250

Rule: Residential Exterior Coatings begins 1/1/2005 ends 12/31/2040 specifies a VOC of 250

Rule: Nonresidential Interior Coatings begins 1/1/2005 ends 12/31/2040 specifies a VOC of 250

Rule: Nonresidential Exterior Coatings begins 1/1/2005 ends 12/31/2040 specifies a VOC of 250

1/17/2012 11:20:30 AM

Construction Mitigated Detail Report:

CONSTRUCTION EMISSION ESTIMATES Annual Tons Per Year, Mitigated

	<u>CO2</u>
2015	124.44
Mass Grading 06/01/2015-06/16/2015	14.10
Mass Grading Dust	0.00
Mass Grading Off Road Diesel	13.48
Mass Grading On Road Diesel	0.00
Mass Grading Worker Trips	0.61
Asphalt 06/16/2015-07/02/2015	10.42
Paving Off-Gas	0.00
Paving Off Road Diesel	8.27
Paving On Road Diesel	0.82
Paving Worker Trips	1.33
Building 07/03/2015-10/22/2015	98.60
Building Off Road Diesel	64.85
Building Vendor Trips	6.69
Building Worker Trips	27.06
Coating 10/23/2015-12/01/2015	1.32
Architectural Coating	0.00
Coating Worker Trips	1.32

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Construction Related Mitigation Measures

The following mitigation measures apply to Phase: Mass Grading 6/1/2015 - 6/16/2015 - Mass Site Grading Description

For Soil Stabilizing Measures, the Water exposed surfaces 2x daily watering mitigation reduces emissions by:

PM10: 55% PM25: 55%

Urbemis 2007 Version 9.2.4

Combined Winter Emissions Reports (Pounds/Day)

File Name: H:\AQ-GHG Models\Rincon del Rio\Construction Emissions - Phase 9:urb924

Project Name: Rincon Del Rio - Construction Phase 9

Project Location: Mountain Counties Air Basin

On-Road Vehicle Emissions Based on: Version : Emfac2007 V2.3 Nov 1 2006

Off-Road Vehicle Emissions Based on: OFFROAD2007

Summary Report:

CONSTRUCTION EMISSION ESTIMATES

CO2

2016 TOTALS (lbs/day unmitigated) 2,349.44

2016 TOTALS (lbs/day mitigated) 2,349.44

Construction Unmitigated Detail Report:

CONSTRUCTION EMISSION ESTIMATES Winter Pounds Per Day, Unmitigated

CO2

Page: 2

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Time Slice 1/15/2016-2/2/2016	<u>2,349.44</u>
Active Days: 13	
Mass Grading 01/15/2016-02/02/2016	2,349.44
Mass Grading Dust	0.00
Mass Grading Off Road Diesel	2,247.32
Mass Grading On Road Diesel	0.00
Mass Grading Worker Trips	102.12
Time Slice 2/3/2016-2/19/2016	1,228.64
Active Days: 13	
Asphalt 02/03/2016-02/20/2016	1,228.64
Paving Off-Gas	0.00
Paving Off Road Diesel	979.23
Paving On Road Diesel	70.69
Paving Worker Trips	178.72
Time Slice 2/22/2016-5/20/2016	1,307.98
Active Days: 65	
Building 02/21/2016-05/22/2016	1,307.98
Building Off Road Diesel	893.39
Building Vendor Trips	82.18
Building Worker Trips	332.42
Time Slice 5/23/2016-6/23/2016	54.10
Active Days: 24	
Coating 05/23/2016-06/23/2016	54.10
Architectural Coating	0.00
Coating Worker Trips	54.10

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Phase Assumptions

Phase: Mass Grading 1/15/2016 - 2/2/2016 - Mass Site Grading Description

Total Acres Disturbed: 3.08

Maximum Daily Acreage Disturbed: 0.77

Fugitive Dust Level of Detail: Default

20 lbs per acre-day

On Road Truck Travel (VMT): 0

Off-Road Equipment:

1 Graders (174 hp) operating at a 0.61 load factor for 6 hours per day

1 Rubber Tired Dozers (357 hp) operating at a 0.59 load factor for 6 hours per day

1 Tractors/Loaders/Backhoes (108 hp) operating at a 0.55 load factor for 7 hours per day

1 Water Trucks (189 hp) operating at a 0.5 load factor for 8 hours per day

Phase: Paving 2/3/2016 - 2/20/2016 - Paving Description

Acres to be Paved: 0.77

Off-Road Equipment:

4 Cement and Mortar Mixers (10 hp) operating at a 0.56 load factor for 6 hours per day

1 Pavers (100 hp) operating at a 0.62 load factor for 7 hours per day

1 Rollers (95 hp) operating at a 0.56 load factor for 7 hours per day

1 Tractors/Loaders/Backhoes (108 hp) operating at a 0.55 load factor for 7 hours per day

Phase: Building Construction 2/21/2016 - 5/22/2016 - Building Construction Description

Off-Road Equipment:

1 Cranes (399 hp) operating at a 0.43 load factor for 4 hours per day

2 Forklifts (145 hp) operating at a 0.3 load factor for 6 hours per day

1 Tractors/Loaders/Backhoes (108 hp) operating at a 0.55 load factor for 8 hours per day

Phase: Architectural Coating 5/23/2016 - 6/23/2016 - Architectural Coating Description

Rule: Residential Interior Coatings begins 1/1/2005 ends 12/31/2040 specifies a VOC of 250

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Rule: Residential Exterior Coatings begins 1/1/2005 ends 12/31/2040 specifies a VOC of 250

Rule: Nonresidential Interior Coatings begins 1/1/2005 ends 12/31/2040 specifies a VOC of 250

Rule: Nonresidential Exterior Coatings begins 1/1/2005 ends 12/31/2040 specifies a VOC of 250

Construction Mitigated Detail Report:

CONSTRUCTION EMISSION ESTIMATES Winter Pounds Per Day, Mitigated

	<u>CO2</u>
Time Slice 1/15/2016-2/2/2016	2,349.44
Active Days: 13	
Mass Grading 01/15/2016-02/02/2016	2,349.44
Mass Grading Dust	0.00
Mass Grading Off Road Diesel	2,247.32
Mass Grading On Road Diesel	0.00
Mass Grading Worker Trips	102.12
Time Slice 2/3/2016-2/19/2016	1,228.64
Active Days: 13	
Asphalt 02/03/2016-02/20/2016	1,228.64
Paving Off-Gas	0.00
Paving Off Road Diesel	979.23
Paving On Road Diesel	70.69
Paving Worker Trips	178.72

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Time Slice 2/22/2016-5/20/2016	1,307.98
Active Days: 65	
Building 02/21/2016-05/22/2016	1,307.98
Building Off Road Diesel	893.39
Building Vendor Trips	82.18
Building Worker Trips	332.42
Time Slice 5/23/2016-6/23/2016	54.10
Active Days: 24	
Coating 05/23/2016-06/23/2016	54.10
Architectural Coating	0.00
Coating Worker Trips	54.10

Construction Related Mitigation Measures

The following mitigation measures apply to Phase: Mass Grading 1/15/2016 - 2/2/2016 - Mass Site Grading Description

For Soil Stabilizing Measures, the Water exposed surfaces 2x daily watering mitigation reduces emissions by:

PM10: 55% PM25: 55%

Urbemis 2007 Version 9.2.4

Combined Annual Emissions Reports (Tons/Year)

File Name: H:\AQ-GHG Models\Rincon del Rio\Construction Emissions - Phase 9.urb924

Project Name: Rincon Del Rio - Construction Phase 9

Project Location: Mountain Counties Air Basin

On-Road Vehicle Emissions Based on: Version : Emfac2007 V2.3 Nov 1 2006

Off-Road Vehicle Emissions Based on: OFFROAD2007

Summary Report:

CONSTRUCTION EMISSION ESTIMATES

	<u>CO2</u>
2016 TOTALS (tons/year unmitigated)	66.42
2016 TOTALS (tons/year mitigated)	66.42
Percent Reduction	0.00

Construction Unmitigated Detail Report:

CONSTRUCTION EMISSION ESTIMATES Annual Tons Per Year, Unmitigated

CO2

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2016	66.42
Mass Grading 01/15/2016-02/02/2016	15.27
Mass Grading Dust	0.00
Mass Grading Off Road Diesel	14.61
Mass Grading On Road Diesel	0.00
Mass Grading Worker Trips	0.66
Asphalt 02/03/2016-02/20/2016	7.99
Paving Off-Gas	0.00
Paving Off Road Diesel	6.36
Paving On Road Diesel	0.46
Paving Worker Trips	1.16
Building 02/21/2016-05/22/2016	42.51
Building Off Road Diesel	29.04
Building Vendor Trips	2.67
Building Worker Trips	10.80
Coating 05/23/2016-06/23/2016	0.65
Architectural Coating	0.00
Coating Worker Trips	0.65

Phase Assumptions

Phase: Mass Grading 1/15/2016 - 2/2/2016 - Mass Site Grading Description

Total Acres Disturbed: 3.08

Maximum Daily Acreage Disturbed: 0.77

Fugitive Dust Level of Detail: Default

20 lbs per acre-day

Page: 3

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On Road Truck Travel (VMT): 0

Off-Road Equipment:

- 1 Graders (174 hp) operating at a 0.61 load factor for 6 hours per day
- 1 Rubber Tired Dozers (357 hp) operating at a 0.59 load factor for 6 hours per day
- 1 Tractors/Loaders/Backhoes (108 hp) operating at a 0.55 load factor for 7 hours per day
- 1 Water Trucks (189 hp) operating at a 0.5 load factor for 8 hours per day

Phase: Paving 2/3/2016 - 2/20/2016 - Paving Description

Acres to be Paved: 0.77

Off-Road Equipment:

- 4 Cement and Mortar Mixers (10 hp) operating at a 0.56 load factor for 6 hours per day
- 1 Pavers (100 hp) operating at a 0.62 load factor for 7 hours per day
- 1 Rollers (95 hp) operating at a 0.56 load factor for 7 hours per day
- 1 Tractors/Loaders/Backhoes (108 hp) operating at a 0.55 load factor for 7 hours per day

Phase: Building Construction 2/21/2016 - 5/22/2016 - Building Construction Description

Off-Road Equipment:

- 1 Cranes (399 hp) operating at a 0.43 load factor for 4 hours per day
- 2 Forklifts (145 hp) operating at a 0.3 load factor for 6 hours per day
- 1 Tractors/Loaders/Backhoes (108 hp) operating at a 0.55 load factor for 8 hours per day

Phase: Architectural Coating 5/23/2016 - 6/23/2016 - Architectural Coating Description

Rule: Residential Interior Coatings begins 1/1/2005 ends 12/31/2040 specifies a VOC of 250

Rule: Residential Exterior Coatings begins 1/1/2005 ends 12/31/2040 specifies a VOC of 250

Rule: Nonresidential Interior Coatings begins 1/1/2005 ends 12/31/2040 specifies a VOC of 250

Rule: Nonresidential Exterior Coatings begins 1/1/2005 ends 12/31/2040 specifies a VOC of 250

Construction Mitigated Detail Report:

1/17/2012 11:23:28 AM

CONSTRUCTION EMISSION ESTIMATES Annual Tons Per Year, Mitigated

	<u>CO2</u>
2016	66.42
Mass Grading 01/15/2016-02/02/2016	15.27
Mass Grading Dust	0.00
Mass Grading Off Road Diesel	14.61
Mass Grading On Road Diesel	0.00
Mass Grading Worker Trips	0.66
Asphalt 02/03/2016-02/20/2016	7.99
Paving Off-Gas	0.00
Paving Off Road Diesel	6.36
Paving On Road Diesel	0.46
Paving Worker Trips	1.16
Building 02/21/2016-05/22/2016	42.51
Building Off Road Diesel	29.04
Building Vendor Trips	2.67
Building Worker Trips	10.80
Coating 05/23/2016-06/23/2016	0.65
Architectural Coating	0.00
Coating Worker Trips	0.65

Construction Related Mitigation Measures

The following mitigation measures apply to Phase: Mass Grading 1/15/2016 - 2/2/2016 - Mass Site Grading Description

For Soil Stabilizing Measures, the Water exposed surfaces 2x daily watering mitigation reduces emissions by:

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PM10: 55% PM25: 55%

Urbemis 2007 Version 9.2.4

Combined Summer Emissions Reports (Pounds/Day)

File Name: H:\AQ-GHG Models\Rincon del Rio\Construction Emissions - Phase 10.urb924

Project Name: Rincon Del Rio - Construction Phase 10

Project Location: Mountain Counties Air Basin

On-Road Vehicle Emissions Based on: Version : Emfac2007 V2.3 Nov 1 2006

Off-Road Vehicle Emissions Based on: OFFROAD2007

Summary Report:

CONSTRUCTION EMISSION ESTIMATES

CO2

2016 TOTALS (lbs/day unmitigated) 2,349.44

2016 TOTALS (lbs/day mitigated) 2,349.44

Construction Unmitigated Detail Report:

CONSTRUCTION EMISSION ESTIMATES Summer Pounds Per Day, Unmitigated

CO2

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Time Slice 6/15/2016-7/1/2016 **2,349.44**
Active Days: 13

Mass Grading 06/15/2016-07/01/2016 2,349.44

Mass Grading Dust 0.00

Mass Grading Off Road Diesel 2,247.32

Mass Grading On Road Diesel 0.00

Mass Grading Worker Trips 102.12

Time Slice 7/4/2016-7/14/2016 1,254.62
Active Days: 9

Asphalt 07/02/2016-07/14/2016 1,254.62

Paving Off-Gas 0.00

Paving Off Road Diesel 979.23

Paving On Road Diesel 96.67

Paving Worker Trips 178.72

Time Slice 7/15/2016-10/21/2016 1,293.96
Active Days: 71

Building 07/15/2016-10/22/2016 1,293.96

Building Off Road Diesel 893.39

Building Vendor Trips 79.40

Building Worker Trips 321.18

Time Slice 10/24/2016-12/2/2016 40.47
Active Days: 30

Coating 10/23/2016-12/02/2016 40.47

Architectural Coating 0.00

Coating Worker Trips 40.47

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Phase Assumptions

Phase: Mass Grading 6/15/2016 - 7/11/2016 - Mass Site Grading Description

Total Acres Disturbed: 3.25

Maximum Daily Acreage Disturbed: 0.81

Fugitive Dust Level of Detail: Default

20 lbs per acre-day

On Road Truck Travel (VMT): 0

Off-Road Equipment:

1 Graders (174 hp) operating at a 0.61 load factor for 6 hours per day

1 Rubber Tired Dozers (357 hp) operating at a 0.59 load factor for 6 hours per day

1 Tractors/Loaders/Backhoes (108 hp) operating at a 0.55 load factor for 7 hours per day

1 Water Trucks (189 hp) operating at a 0.5 load factor for 8 hours per day

Phase: Paving 7/2/2016 - 7/14/2016 - Paving Description

Acres to be Paved: 0.81

Off-Road Equipment:

4 Cement and Mortar Mixers (10 hp) operating at a 0.56 load factor for 6 hours per day

1 Pavers (100 hp) operating at a 0.62 load factor for 7 hours per day

1 Rollers (95 hp) operating at a 0.56 load factor for 7 hours per day

1 Tractors/Loaders/Backhoes (108 hp) operating at a 0.55 load factor for 7 hours per day

Phase: Building Construction 7/15/2016 - 10/22/2016 - Building Construction Description

Off-Road Equipment:

1 Cranes (399 hp) operating at a 0.43 load factor for 4 hours per day

2 Forklifts (145 hp) operating at a 0.3 load factor for 6 hours per day

1 Tractors/Loaders/Backhoes (108 hp) operating at a 0.55 load factor for 8 hours per day

Phase: Architectural Coating 10/23/2016 - 12/2/2016 - Architectural Coating Description

Rule: Residential Interior Coatings begins 1/1/2005 ends 12/31/2040 specifies a VOC of 250

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Rule: Residential Exterior Coatings begins 1/1/2005 ends 12/31/2040 specifies a VOC of 250

Rule: Nonresidential Interior Coatings begins 1/1/2005 ends 12/31/2040 specifies a VOC of 250

Rule: Nonresidential Exterior Coatings begins 1/1/2005 ends 12/31/2040 specifies a VOC of 250

Construction Mitigated Detail Report:

CONSTRUCTION EMISSION ESTIMATES Summer Pounds Per Day, Mitigated

	<u>CO2</u>
Time Slice 6/15/2016-7/1/2016	2,349.44
Active Days: 13	
Mass Grading 06/15/2016-07/01/2016	2,349.44
Mass Grading Dust	0.00
Mass Grading Off Road Diesel	2,247.32
Mass Grading On Road Diesel	0.00
Mass Grading Worker Trips	102.12
Time Slice 7/4/2016-7/14/2016	1,254.62
Active Days: 9	
Asphalt 07/02/2016-07/14/2016	1,254.62
Paving Off-Gas	0.00
Paving Off Road Diesel	979.23
Paving On Road Diesel	96.67
Paving Worker Trips	178.72

1/17/2012 11:26:29 AM

Time Slice 7/15/2016-10/21/2016	1,293.96
Active Days: 71	
Building 07/15/2016-10/22/2016	1,293.96
Building Off Road Diesel	893.39
Building Vendor Trips	79.40
Building Worker Trips	321.18
Time Slice 10/24/2016-12/2/2016	40.47
Active Days: 30	
Coating 10/23/2016-12/02/2016	40.47
Architectural Coating	0.00
Coating Worker Trips	40.47

Construction Related Mitigation Measures

The following mitigation measures apply to Phase: Mass Grading 6/15/2016 - 7/1/2016 - Mass Site Grading Description

For Soil Stabilizing Measures, the Water exposed surfaces 2x daily watering mitigation reduces emissions by:

PM10: 55% PM25: 55%

Urbemis 2007 Version 9.2.4

Combined Annual Emissions Reports (Tons/Year)

File Name: H:\AQ-GHG Models\Rincon del Rio\Construction Emissions - Phase 10.urb924

Project Name: Rincon Del Rio - Construction Phase 10

Project Location: Mountain Counties Air Basin

On-Road Vehicle Emissions Based on: Version : Emfac2007 V2.3 Nov 1 2006

Off-Road Vehicle Emissions Based on: OFFROAD2007

Summary Report:

CONSTRUCTION EMISSION ESTIMATES

	<u>CO2</u>
2016 TOTALS (tons/year unmitigated)	67.46
2016 TOTALS (tons/year mitigated)	67.46
Percent Reduction	0.00

Construction Unmitigated Detail Report:

CONSTRUCTION EMISSION ESTIMATES Annual Tons Per Year, Unmitigated

CO2

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2016	67.46
Mass Grading 06/15/2016-07/01/2016	15.27
Mass Grading Dust	0.00
Mass Grading Off Road Diesel	14.61
Mass Grading On Road Diesel	0.00
Mass Grading Worker Trips	0.66
Asphalt 07/02/2016-07/14/2016	5.65
Paving Off-Gas	0.00
Paving Off Road Diesel	4.41
Paving On Road Diesel	0.44
Paving Worker Trips	0.80
Building 07/15/2016-10/22/2016	45.94
Building Off Road Diesel	31.72
Building Vendor Trips	2.82
Building Worker Trips	11.40
Coating 10/23/2016-12/02/2016	0.61
Architectural Coating	0.00
Coating Worker Trips	0.61

Phase Assumptions

Phase: Mass Grading 6/15/2016 - 7/1/2016 - Mass Site Grading Description

Total Acres Disturbed: 3.25

Maximum Daily Acreage Disturbed: 0.81

Fugitive Dust Level of Detail: Default

20 lbs per acre-day

Page: 3

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On Road Truck Travel (VMT): 0

Off-Road Equipment:

- 1 Graders (174 hp) operating at a 0.61 load factor for 6 hours per day
- 1 Rubber Tired Dozers (357 hp) operating at a 0.59 load factor for 6 hours per day
- 1 Tractors/Loaders/Backhoes (108 hp) operating at a 0.55 load factor for 7 hours per day
- 1 Water Trucks (189 hp) operating at a 0.5 load factor for 8 hours per day

Phase: Paving 7/2/2016 - 7/14/2016 - Paving Description

Acres to be Paved: 0.81

Off-Road Equipment:

- 4 Cement and Mortar Mixers (10 hp) operating at a 0.56 load factor for 6 hours per day
- 1 Pavers (100 hp) operating at a 0.62 load factor for 7 hours per day
- 1 Rollers (95 hp) operating at a 0.56 load factor for 7 hours per day
- 1 Tractors/Loaders/Backhoes (108 hp) operating at a 0.55 load factor for 7 hours per day

Phase: Building Construction 7/15/2016 - 10/22/2016 - Building Construction Description

Off-Road Equipment:

- 1 Cranes (399 hp) operating at a 0.43 load factor for 4 hours per day
- 2 Forklifts (145 hp) operating at a 0.3 load factor for 6 hours per day
- 1 Tractors/Loaders/Backhoes (108 hp) operating at a 0.55 load factor for 8 hours per day

Phase: Architectural Coating 10/23/2016 - 12/2/2016 - Architectural Coating Description

Rule: Residential Interior Coatings begins 1/1/2005 ends 12/31/2040 specifies a VOC of 250

Rule: Residential Exterior Coatings begins 1/1/2005 ends 12/31/2040 specifies a VOC of 250

Rule: Nonresidential Interior Coatings begins 1/1/2005 ends 12/31/2040 specifies a VOC of 250

Rule: Nonresidential Exterior Coatings begins 1/1/2005 ends 12/31/2040 specifies a VOC of 250

Construction Mitigated Detail Report:

1/17/2012 11:26:46 AM

CONSTRUCTION EMISSION ESTIMATES Annual Tons Per Year, Mitigated

	<u>CO2</u>
2016	67.46
Mass Grading 06/15/2016-07/01/2016	15.27
Mass Grading Dust	0.00
Mass Grading Off Road Diesel	14.61
Mass Grading On Road Diesel	0.00
Mass Grading Worker Trips	0.66
Asphalt 07/02/2016-07/14/2016	5.65
Paving Off-Gas	0.00
Paving Off Road Diesel	4.41
Paving On Road Diesel	0.44
Paving Worker Trips	0.80
Building 07/15/2016-10/22/2016	45.94
Building Off Road Diesel	31.72
Building Vendor Trips	2.82
Building Worker Trips	11.40
Coating 10/23/2016-12/02/2016	0.61
Architectural Coating	0.00
Coating Worker Trips	0.61

Construction Related Mitigation Measures

The following mitigation measures apply to Phase: Mass Grading 6/15/2016 - 7/1/2016 - Mass Site Grading Description

For Soil Stabilizing Measures, the Water exposed surfaces 2x daily watering mitigation reduces emissions by:

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PM10: 55% PM25: 55%

Urbemis 2007 Version 9.2.4

Combined Winter Emissions Reports (Pounds/Day)

File Name: H:\AQ-GHG Models\Rincon del Rio\Construction Emissions - Paved Trail System.urb924

Project Name: Rincon Del Rio - Paved Trail System

Project Location: Mountain Counties Air Basin

On-Road Vehicle Emissions Based on: Version : Emfac2007 V2.3 Nov 1 2006

Off-Road Vehicle Emissions Based on: OFFROAD2007

Summary Report:

CONSTRUCTION EMISSION ESTIMATES

CO2

2017 TOTALS (lbs/day unmitigated) 3,589.42

Construction Unmitigated Detail Report:

CONSTRUCTION EMISSION ESTIMATES Winter Pounds Per Day, Unmitigated

CO2

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1/17/2012 11:29:20 AM

Time Slice 3/30/2017-4/10/2017	2,422.87
Active Days: 8	
Building 03/30/2017-04/30/2017	73.39
Building Off Road Diesel	0.00
Building Vendor Trips	14.54
Building Worker Trips	58.85
Mass Grading 03/30/2017-04/11/2017	2,349.48
Mass Grading Dust	0.00
Mass Grading Off Road Diesel	2,247.32
Mass Grading On Road Diesel	0.00
Mass Grading Worker Trips	102.17

1/17/2012 11:29:20 AM

Time Slice 4/11/2017-4/11/2017	<u>3,589.42</u>
Active Days: 1	
Asphalt 04/11/2017-04/30/2017	1,166.54
Paving Off-Gas	0.00
Paving Off Road Diesel	979.23
Paving On Road Diesel	8.53
Paving Worker Trips	178.79
Building 03/30/2017-04/30/2017	73.39
Building Off Road Diesel	0.00
Building Vendor Trips	14.54
Building Worker Trips	58.85
Mass Grading 03/30/2017-04/11/2017	2,349.48
Mass Grading Dust	0.00
Mass Grading Off Road Diesel	2,247.32
Mass Grading On Road Diesel	0.00
Mass Grading Worker Trips	102.17

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Time Slice 4/12/2017-4/28/2017	1,239.93
Active Days: 13	
Asphalt 04/11/2017-04/30/2017	1,166.54
Paving Off-Gas	0.00
Paving Off Road Diesel	979.23
Paving On Road Diesel	8.53
Paving Worker Trips	178.79
Building 03/30/2017-04/30/2017	73.39
Building Off Road Diesel	0.00
Building Vendor Trips	14.54
Building Worker Trips	58.85

Phase Assumptions

Phase: Mass Grading 3/30/2017 - 4/11/2017 - Paved Trail System

Total Acres Disturbed: 0.41

Maximum Daily Acreage Disturbed: 0.1

Fugitive Dust Level of Detail: Default

20 lbs per acre-day

On Road Truck Travel (VMT): 0

Off-Road Equipment:

1 Graders (174 hp) operating at a 0.61 load factor for 6 hours per day

1 Rubber Tired Dozers (357 hp) operating at a 0.59 load factor for 6 hours per day

1 Tractors/Loaders/Backhoes (108 hp) operating at a 0.55 load factor for 7 hours per day

1 Water Trucks (189 hp) operating at a 0.5 load factor for 8 hours per day

Phase: Paving 4/11/2017 - 4/30/2017 - Pavement

Acres to be Paved: 0.1

Off-Road Equipment:

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4 Cement and Mortar Mixers (10 hp) operating at a 0.56 load factor for 6 hours per day

1 Pavers (100 hp) operating at a 0.62 load factor for 7 hours per day

1 Rollers (95 hp) operating at a 0.56 load factor for 7 hours per day

1 Tractors/Loaders/Backhoes (108 hp) operating at a 0.55 load factor for 7 hours per day

Phase: Building Construction 3/30/2017 - 4/30/2017 - Worker Trips

Off-Road Equipment:

Urbemis 2007 Version 9.2.4

Combined Annual Emissions Reports (Tons/Year)

File Name: H:\AQ-GHG Models\Rincon del Rio\Construction Emissions - Paved Trail System.urb924

Project Name: Rincon Del Rio - Paved Trail System

Project Location: Mountain Counties Air Basin

On-Road Vehicle Emissions Based on: Version : Emfac2007 V2.3 Nov 1 2006

Off-Road Vehicle Emissions Based on: OFFROAD2007

Summary Report:

CONSTRUCTION EMISSION ESTIMATES

CO2

2017 TOTALS (tons/year unmitigated)

19.55

Construction Unmitigated Detail Report:

CONSTRUCTION EMISSION ESTIMATES Annual Tons Per Year, Unmitigated

CO2

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2017	19.55
Building 03/30/2017-04/30/2017	0.81
Building Off Road Diesel	0.00
Building Vendor Trips	0.16
Building Worker Trips	0.65
Mass Grading 03/30/2017-04/11/2017	10.57
Mass Grading Dust	0.00
Mass Grading Off Road Diesel	10.11
Mass Grading On Road Diesel	0.00
Mass Grading Worker Trips	0.46
Asphalt 04/11/2017-04/30/2017	8.17
Paving Off-Gas	0.00
Paving Off Road Diesel	6.85
Paving On Road Diesel	0.06
Paving Worker Trips	1.25

Phase Assumptions

Phase: Mass Grading 3/30/2017 - 4/11/2017 - Paved Trail System

Total Acres Disturbed: 0.41

Maximum Daily Acreage Disturbed: 0.1

Fugitive Dust Level of Detail: Default

20 lbs per acre-day

On Road Truck Travel (VMT): 0

Off-Road Equipment:

1 Graders (174 hp) operating at a 0.61 load factor for 6 hours per day

1 Rubber Tired Dozers (357 hp) operating at a 0.59 load factor for 6 hours per day

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1 Tractors/Loaders/Backhoes (108 hp) operating at a 0.55 load factor for 7 hours per day

1 Water Trucks (189 hp) operating at a 0.5 load factor for 8 hours per day

Phase: Paving 4/11/2017 - 4/30/2017 - Pavement

Acres to be Paved: 0.1

Off-Road Equipment:

4 Cement and Mortar Mixers (10 hp) operating at a 0.56 load factor for 6 hours per day

1 Pavers (100 hp) operating at a 0.62 load factor for 7 hours per day

1 Rollers (95 hp) operating at a 0.56 load factor for 7 hours per day

1 Tractors/Loaders/Backhoes (108 hp) operating at a 0.55 load factor for 7 hours per day

Phase: Building Construction 3/30/2017 - 4/30/2017 - Worker Trips

Off-Road Equipment:

Urbemis 2007 Version 9.2.4

Combined Winter Emissions Reports (Pounds/Day)

File Name: H:\AQ-GHG Models\Rincon del Rio\Construction Emissions - Unpaved Trail System.urb924

Project Name: Rincon del Rio - Trail System - Unpaved

Project Location: Mountain Counties Air Basin

On-Road Vehicle Emissions Based on: Version : Emfac2007 V2.3 Nov 1 2006

Off-Road Vehicle Emissions Based on: OFFROAD2007

Summary Report:

CONSTRUCTION EMISSION ESTIMATES

CO2

2017 TOTALS (lbs/day unmitigated)

2,838.75

Construction Unmitigated Detail Report:

CONSTRUCTION EMISSION ESTIMATES Winter Pounds Per Day, Unmitigated

CO2

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Time Slice 3/30/2017-6/9/2017	<u>2,838.75</u>
Active Days: 52	
Building 03/30/2017-06/11/2017	489.27
Building Off Road Diesel	0.00
Building Vendor Trips	96.95
Building Worker Trips	392.32
Mass Grading 03/30/2017-06/11/2017	2,349.48
Mass Grading Dust	0.00
Mass Grading Off Road Diesel	2,247.32
Mass Grading On Road Diesel	0.00
Mass Grading Worker Trips	102.17

Phase Assumptions

Phase: Mass Grading 3/30/2017 - 6/11/2017 - Trail Development

Total Acres Disturbed: 2.75

Maximum Daily Acreage Disturbed: 0.69

Fugitive Dust Level of Detail: Default

20 lbs per acre-day

On Road Truck Travel (VMT): 0

Off-Road Equipment:

1 Graders (174 hp) operating at a 0.61 load factor for 6 hours per day

1 Rubber Tired Dozers (357 hp) operating at a 0.59 load factor for 6 hours per day

1 Tractors/Loaders/Backhoes (108 hp) operating at a 0.55 load factor for 7 hours per day

1 Water Trucks (189 hp) operating at a 0.5 load factor for 8 hours per day

Phase: Building Construction 3/30/2017 - 6/11/2017 - Worker Trips

Off-Road Equipment:

Urbemis 2007 Version 9.2.4

Combined Annual Emissions Reports (Tons/Year)

File Name: H:\AQ-GHG Models\Rincon del Rio\Construction Emissions - Unpaved Trail System.urb924

Project Name: Rincon del Rio - Trail System - Unpaved

Project Location: Mountain Counties Air Basin

On-Road Vehicle Emissions Based on: Version : Emfac2007 V2.3 Nov 1 2006

Off-Road Vehicle Emissions Based on: OFFROAD2007

Summary Report:

CONSTRUCTION EMISSION ESTIMATES

CO2

2017 TOTALS (tons/year unmitigated)

73.81

Construction Unmitigated Detail Report:

CONSTRUCTION EMISSION ESTIMATES Annual Tons Per Year, Unmitigated

CO2

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2017	73.81
Building 03/30/2017-06/11/2017	12.72
Building Off Road Diesel	0.00
Building Vendor Trips	2.52
Building Worker Trips	10.20
Mass Grading 03/30/2017-06/11/2017	61.09
Mass Grading Dust	0.00
Mass Grading Off Road Diesel	58.43
Mass Grading On Road Diesel	0.00
Mass Grading Worker Trips	2.66

Phase Assumptions

Phase: Mass Grading 3/30/2017 - 6/11/2017 - Trail Development

Total Acres Disturbed: 2.75

Maximum Daily Acreage Disturbed: 0.69

Fugitive Dust Level of Detail: Default

20 lbs per acre-day

On Road Truck Travel (VMT): 0

Off-Road Equipment:

1 Graders (174 hp) operating at a 0.61 load factor for 6 hours per day

1 Rubber Tired Dozers (357 hp) operating at a 0.59 load factor for 6 hours per day

1 Tractors/Loaders/Backhoes (108 hp) operating at a 0.55 load factor for 7 hours per day

1 Water Trucks (189 hp) operating at a 0.5 load factor for 8 hours per day

Phase: Building Construction 3/30/2017 - 6/11/2017 - Worker Trips

Off-Road Equipment:

Rincon Del Rio CCRC
Vehicle
Greenhouse Gas Emissions

Direct Emissions

CCRC

URBEMIS CO2 Output

Mobile Source

1,828 tons/year

0.907 metric ton/English ton

1,658 MT/yr

Rincon Del Rio CCRC
Area Source
Greenhouse Gas Emissions

Direct Emissions

CCRC	URBEMIS CO2 Output		
Area Source	1,683 tons/year	0.907 metric ton/English ton	1,526 MT/yr

Rincon Del Rio CCRC
Greenhouse Gas Emissions
Net Energy Consumption

Land Use	Units CCRC	Electricity Demand (kWh)		GHG MTCO2e
		Per Unit	CCRC	
Retirement Community	345	6992	2412240	705.4440291
Total				705.4440291

Source: Energy Information Administration. 2005. <http://www.eia.doe.gov/emeu/recs/recs2005/c&e/summary/pdf/tableus8.pdf>

Land Use	Units CCRC	Natural Gas Demand (kBTU)		GHG MTCO2e
		per SF	CCRC	
Retirement Community	345	46200	15939000	853.8028422
Total				853.8028422

Source: Energy Information Administration. 2005. <http://www.eia.doe.gov/emeu/recs/recs2005/c&e/summary/pdf/tableus9.pdf>

Source: http://www.energystar.gov/ia/business/tools_resources/target_finder/help/Energy_Units_Conversion_Table.htm

Total MTCO2e: 1559.246871

Conversion Factors	CO2	CH4	N2O
Electricity (MT/kWh)	0.00029076000	0.00000001315	0.00000000454
Natural Gas (MT/therm)	0.00530709000	0.00000110000	0.00000016000

Source: California Climate Action Registry, Local Government Operations Protocol v1.1.

Rincon Del Rio CCRC
Greenhouse Gas Emissions Water / Wastewater

Water Demand	CCRC
Acre-Feet	119

Source: Bay Area Air Quality Management District. 2010. Bay Area Air Quality Management District Greenhouse Gas Model User's Manual

Indirect Emissions

Indirect Emissions from Water Use (includes wastewater treatment)

CCRC	MG/yr	MWh/MG	MWh/yr	Total CO2e MT/yr
	39	5.4	209	69

California Energy Commission. 2006. Redefining Estimates for Water-Related Energy Use (<http://www.energy.ca.gov/2006publications/CEC-500-2006-118/CEC-500-2006-118.PDF>)

Rincon Del Rio CCRC
Greenhouse Gas Emissions Solid Waste Hauling and Decomposition

Waste Generation	CCRC
Tons/year	770

Source: Bay Area Air Quality Management District. 2010. Bay Area Air Quality Management District Greenhouse Gas Model User's Manual

Indirect Emissions

Indirect Emissions from Solid Waste Hauling and Solid Waste Decomposition

	CO2e MT/yr
CCRC	492

Bay Area Air Quality Management District. 2010. Bay Area Air Quality Management District Greenhouse Gas Model User's Manual

Rincon Del Rio
GHG-Reducing Project Components

Baseline Summary

Baseline GHGs Attributed to Project	MTCO₂e
Electricity	705.00
Area Source	1,526.00
Natural Gas	853.00
Vehicles	1,658.00
Solid Waste	492.00
Water-Wastewater	69.00
TOTAL	5,303.00

Project Reductions Summary

Project Components	GHG Reduction
1. Title 24	114.73
2. Senate Bill 2X	148.76
3. Pavley I	262.58
CalGreen Tier 1 Standards	103.81
TOTAL	629.87
Revised Project Emissions per year	4,673.13

Project Component Detail

1. Title 24

The project will at minimum meet the 2008 Title 24 standards, which reduce electricity by 4.9% below baseline and reduce natural gas usage by over 9.4% below baseline. The project will also adhere to CalGreen Tier 1 Standards . Tier 1 efficiency exceeds 2008 energy standard requirements by 15%. According to CAPCOA, the project will achieve a 0.05% reduction in electricity for each percentage above 2008 standards and a 0.77%.

GHG Reduction:	114.73
CalGreen Tier 1	218.5

2. Senate Bill 2X - Renewable Portfolio Standard

PG&E BAU Renewable Mix (2008)	11.90%
PG&E Renewable Mix Under RPS (2020)	33%
GHG Reduction:	148.76

Rincon Del Rio
GHG-Reducing Project Components

3. Pavley I

According to URBEMIS, 87.6% of vehicle trips are from passenger cars, light duty trucks, and medium duty trucks are subject to Pavley (AB 1493). The Post-Processor tool provided by the Air Resources Board estimates a 18% reduction in GHG in these vehicle classes by 2020.

GHG Reduction: 262.5755

Urbemis 2007 Version 9.2.4

Combined Annual Emissions Reports (Tons/Year)

File Name: H:\AQ-GHG Models\Rincon del Rio\Buildout Operational Emissions.urb924

Project Name: Rincon Del Rio - Buildout Operations

Project Location: Mountain Counties Air Basin

On-Road Vehicle Emissions Based on: Version : Emfac2007 V2.3 Nov 1 2006

Off-Road Vehicle Emissions Based on: OFFROAD2007

Summary Report:

AREA SOURCE EMISSION ESTIMATES

	<u>CO2</u>
TOTALS (tons/year, unmitigated)	1,682.89

OPERATIONAL (VEHICLE) EMISSION ESTIMATES

	<u>CO2</u>
TOTALS (tons/year, unmitigated)	1,828.22

SUM OF AREA SOURCE AND OPERATIONAL EMISSION ESTIMATES

	<u>CO2</u>
TOTALS (tons/year, unmitigated)	3,511.11

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Area Source Unmitigated Detail Report:

AREA SOURCE EMISSION ESTIMATES Annual Tons Per Year, Unmitigated

<u>Source</u>	<u>CO2</u>
Natural Gas	1,678.58
Hearth	1.83
Landscape	2.48
Consumer Products	
Architectural Coatings	
TOTALS (tons/year, unmitigated)	1,682.89

Area Source Changes to Defaults

Percent residential using natural gas changed from 60% to 100%

Percentage of residences with wood stoves changed from 35% to 0%

Percentage of residences with wood fireplaces changed from 10% to 0%

Percentage of residences with natural gas fireplaces changed from 55% to 100%

Operational Unmitigated Detail Report:

OPERATIONAL EMISSION ESTIMATES Annual Tons Per Year, Unmitigated

<u>Source</u>	<u>CO2</u>
Retirement community	1,828.22
TOTALS (tons/year, unmitigated)	1,828.22

Operational Settings:

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Does not include correction for passby trips

Does not include double counting adjustment for internal trips

Analysis Year: 2016 Season: Annual

Emfac: Version : Emfac2007 V2.3 Nov 1 2006

Summary of Land Uses

Land Use Type	Acreage	Trip Rate	Unit Type	No. Units	Total Trips	Total VMT
Retirement community	40.00	2.81	dwelling units	345.00	969.45	10,357.70
					969.45	10,357.70

Vehicle Fleet Mix

Vehicle Type	Percent Type	Non-Catalyst	Catalyst	Diesel
Light Auto	32.5	0.3	99.4	0.3
Light Truck < 3750 lbs	24.4	1.2	91.8	7.0
Light Truck 3751-5750 lbs	19.8	0.5	99.0	0.5
Med Truck 5751-8500 lbs	9.2	0.0	98.9	1.1
Lite-Heavy Truck 8501-10,000 lbs	2.5	0.0	72.0	28.0
Lite-Heavy Truck 10,001-14,000 lbs	1.2	0.0	50.0	50.0
Med-Heavy Truck 14,001-33,000 lbs	0.9	0.0	22.2	77.8
Heavy-Heavy Truck 33,001-60,000 lbs	0.9	0.0	0.0	100.0
Other Bus	0.1	0.0	0.0	100.0
Urban Bus	0.0	0.0	0.0	0.0
Motorcycle	6.4	45.3	54.7	0.0
School Bus	0.1	0.0	0.0	100.0
Motor Home	2.0	0.0	85.0	15.0