



BCWCID #2
Annual Road Meeting

March 30, 2019

Recognizing of Dignitaries and Invitees

- Judge Paul Pape, Bastrop County
- Mel Hamner ~ Commissioner, Bastrop County
- Connie Schroeder ~ Mayor, City of Bastrop
- Linda Humble ~ City Manager, City of Bastrop
- Trey Job ~ Director of Public Works, City of Bastrop
- Bill Ennis ~ Council, City of Bastrop
- Willie L. Peterson ~ Council, City of Bastrop
- Drusilla Rogers ~ Council, City of Bastrop
- Deborah Jones ~ Council, City of Bastrop
- Lyle Nelson ~ Council, City of Bastrop
- Tim Sanders ~ PE, BEFCO Engineering
- Gene Kruppa ~ PE, on behalf of BEFCO Engineering

BCWCID #2 Road Committee

Volunteers & Unit Assignments

- Paul Hightower – BCWCID #2 General Manager
- Scott Ferguson – BCWCID #2 Director & Committee Chair
- Gwen Winter– Unit 1
- JoAnne Egitto Unit 2 and Co-Chair
- Michele Plummer– Unit 3
- VACANT – Unit 4
- Kathleen Newton – Unit 5
- Alma Rodriguez – District Administrator
- Tyler Walsh - Operations Manager
- Mary Beth O’Hanlon – BCWCID #2 Board President

THANK YOU FOR YOUR SERVICE

Presentation Overview

- Accomplishments/Challenges Since Last Meeting
 - FEMA Repairs & Landslides – Owed \$360K from FEMA
 - 2.6Mi & 132 Homes completed
 - 3.6Mi & 133 Homes on Roads Ready For chip seal in Spring / Summer 2019
 - 2.6Mi & 98 Homes to be started in 2019 and completed in early 2020
- Building FY 2019-24 Plan
 - FY = Oct 1 – Sep 30



First 40+ years

Tahitian Established in the 70's All Platted and Road Designs Approved

- All Arterial Roads Completed
- 46% of All Roads Completed 29Mi of 63Mi
- **64%** of Resident's Homes on Completed Roads as at January 1, 2019
 - Up 4% from last year's presentation (132 existing Homes Added)
 - Cost of Materials Increased 7.5% in 2018
- Approx. 1637 Road District Homes in Total
 - Increase of 86 new homes from last year
 - 25 new-builds on an already paved road
- Re-Established use of Contractors to Build Roads Faster; and then County Complete
 - County has limited Resources but saves District Approx. \$50K per Mile on Completion
 - 3.6Mi predominately ready for Chip Seal
- Funded Via Road District Statute
 - \$18 per lot per Month .. \$204 per year
 - \$21 Max by Current Statute Updated 2017
 - All lots (Vacant & Occupied)
 - Average Cost for Mile of Road with Engineering Estimated at \$250K

Review of Road Construction Process Changes Beginning in 2014

- Road Selection Prioritized by Highest Home Density
 - Home Density is defined by the highest # of homes per feet of street where the smallest Home Density factor = the highest density of homes
 - 10 homes/1000 feet of street (or 100 Home Density) is prioritized above 4 homes/1000 feet of street (or 250 Home Density)
- Other Factors Used for Selection
 - Roads within Disaster Area where FEMA Money was used
 - Feeder Streets where multiple highly populated roads feed thru a lesser populated road
 - Emergency Access /Bus Routes
 - High Risk Roads - IE: elevation/slope, single lanes and drainage,
 - Logical groupings for efficiency & completeness
- 2019 - 75% of Road Fees collected to be used for Road Construction and 25% for Road Maintenance compared to 2018 85% of Construction and 15% Maintenance
- Roads, once completed, will be accepted by County after walk-thru, approval and following a 1-year warranty period.

Major Road Maintenance – 2018 List

Motor Grader Work, Majority Also Rolled

- **We had a total of 22 roads that were in the maintenance work completed for the year.**
- **We used 4,873 total tons of material (reclaimed concrete or flex base) and covered 24,785' of roadway maintenance.**
- **This does not include new construction or the chip sealing/prepping that was completed.**

Key Factors in Building - Oct 2019/Sept 2024 - 5 Year Plan

- Updated Density Figures
 - Road Committee reviewed and Inventoried All Roads Late 2018
 - Engineering surveys started for Year 1 locked roads
 - Construction to Start October 2019
- When Planning FY2019/24 - take into consideration all new builds and reprioritize again ALL roads for construction based on home density.
 - First years locked for planning purposes.
 - Ulupau Rd (Intersects with a new planned Egress/Ingress)
 - ILA Being Negotiated with County which is at a considerable savings to the District



2018 Financials for Road Construction/Road Maintenance

- An un-audited financial analysis is available on the website and will be completed once our final 2018 audit is complete, expected in April.
- We collected \$1.312M with a 95% historical collection rate
- In 2018, roads were constructed with the use of contracted labor, WCID2 labor and support of the Bastrop County via Interlocal Agreements.
- Projected road fees and FEMA reimbursements will be used to fund 2019 chip seal & road construction
- **Positive Impact towards Maintenance Goal**
 - **\$10K Donation by TV POA – Thank you**

2018 Road Summary

- In 2018, the following roads were conveyed to the Bastrop County and City: Ulupau Circle (concrete portion), Kalama Drive and Kai Court.
- In 2018, \$ 551K was spent on road maintenance and \$630K, on road reconstruction. roads were reconstructed with the use of contracted labor, WCID2 labor and support of the Bastrop County or Bastrop City via Interlocal Agreements. (Numbers are Pre-Audit)
- At the end of 2018, The following roads were still reported as not conveyed to the Bastrop County or Bastrop City because they were not yet complete or still within the warranty period: Lamaloa Lane, N & S Kaupo Drive, Konhuanui Lane, Kalapu Court, Kamaiki Drive, Pahoiki Lane, Kimo Court, Kaena Lane, Huelo Court, Awehi Lane, Papaloa Lane, N & S Kanaio Drive, Kokomo Lane, Upola Court, Haloomaile Lane, Kou Court, Ahumoa Drive, Papawai Drive, Kaliu Court, Ohana Court, Pele Court, Puu Waa Waa Lane, E & W Maunalua Drive, Kaenapapa Lane, Haou Court, Kulua Court, N. Pahihi and Koaie Court.
- By Approving the Plan at the annual road meeting, the 1992 Master plan is updated and also communicated to the District residents, the Bastrop County and Bastrop City for the change in road inventory, roads to be reconstructed in 2019, future plans and cost estimates to complete.
- Most recent estimate of costs to complete the project for 100% conveyance of all roads to the Bastrop County or Bastrop City is \$8 Million.
- Increased road fees can speed up the process and/or account for inflation
- Copies of this presentation will be also available on the BCWCID2 web portal

2019/20 Flood/Road Maintenance Priorities

- Flood – Repairs taking priority (County and District) 97% Complete
- FEMA reimburses 75% of costs, after the work is completed
- 2 New Hires Full Time on Roads
 - Team to Use County Equipment (Grader & Roller) with ILA
 - State certified operator training offered at no cost from County and TXLAP sources
 - Improve Maintenance Process & Assist in Construction
 - Unfinished roads will be prioritized to be graded and rolled

Thank you Bastrop County Pct #1 For this Great Opportunity!

2019/20 Planned Construction Goals, Priorities & Challenges

- Chip Seal & Completion of In Process Roads to Start May/June
 - Road base material cost projected to remain locked thru at least the summer–
 - Current Estimate at \$250K/mile with Engineering
 - Cost of oil for chip seal is still a variable
- Costs of Roads in High Density Areas are more expensive per mile due to extra cost per driveway
- Lessons learned from previous years with process changes;
 - Subcontractors need to be well managed for quality and efficiency
 - Fixed Price Proposal to be Managed by BCWCID & County
 - Need County oversight / partnership as well to ensure standards are met
 - County to Partner with BCWCID2 and BEFCO on Designs
 - Construction requirements approved at Road level with County
 - County to Run / Manage Bid Process

Data Assessed to Build New 5 Year Road Plan

- Bastrop WCID2 5-year Road Plan by Road Committee and BEFCO
 - Streets Paved (by Feet)
 - Streets Not Paved (by Feet)
- List of Active Water Meters (Updated with New Home Builds in 2018)
 - Houses on Paved streets
 - # of Houses on Unpaved streets
 - Feet of Unpaved Street divided by # of Houses on that Street
- Bastrop Bus Routes
- BCWCID Maps (Updated with New Road Paved Data)
 - Connection to County/City Roads
 - Collector Streets
 - Feeder Streets; which are streets used to get from a smaller to a larger road.
- Roads added when it was logical to add to complete an area

New 5 Year Plan – Items Needed for Success

Factors Affecting Maximum Annual Road Construction

1. County ability to complete 2016 & 2017 Roads this Spring/Summer in order to keep our New 5 Year Plan on Track to begin September 2019.
2. Timely reimbursement from FEMA Funding for Roads Repaired/Constructed.
3. Need to maintain Collection Rates
4. No new disasters; IE – flooding, fires, etc.
5. 5 Year Plan Assumes the ability to do approx. 2.5 miles per year
 - Expected efficiencies from in-house road crew have not yet been evaluated

Proposed Road Projects – Oct 2019/ Sep 2020 (This Year)

October 2018 - September 2019 (Year 1) -- Start 2019 Finish 2020

Unit	Collector Road	Total Paved	Street	Length of Unpaved Road Measured by Feet	Homes	Feet Between Homes Being Paved	Home Density of Roads to Be Paved; serviced	Previous 5 Year Planned Date to Pave	Bus Route Y/N	Comments
2	Collector	1100	Pahalawe Lane	1100	4	275	214	2018/2019	Yes	Off Tahitian -
2		0	Alele	3150	13	242			Yes	Already Paved
2		0	Pukoo	1950	7	279				2021-2022
2		1740	Kaapahu	1740	12	145		2018/2019	No	Pahalawe
5	Feeder	900	Mokulua Lane	3230	11	82	118	2018/2019	1 stop	Bus goes down between Pohakuloa and Waikakaaua.
5		700	Waimalu	700	5	140		2018/2019	No	Off Mokulua
5		420	Kipapa	420	2	210			No	Added New -Complete Area
3	Feeder	1771	Keawakapu	1771	5	354	96	2018/2019	No	2529 in 0
3		500	Kaeleku Ln	500	5	100		2018/2019	Yes	Off Airport Rd
3		650	Ninole Ct	650	11	59		2020/2024	No	New Homes
3		850	Waianae Ct	850	11	77		2020/2024	No	New Homes
5	Feeder	2200	Keanahalululu Ln	2200	11	200	206	2018/2019	No	Eastern end up hill. Pave full remaining portion
5		130	Kapapa	130	3	43		Not Planned	No	Complete Area
5		300	Nuupia	300	3	100		Not Planned	No	Complete Area
5		520	Kaimuki	520	1	520		Not planned	No	Complete Area
5		350	Olomana	350	1	350		Not planned	No	Complete Area
4		450	Kauai Ct	450	5	90	206	2019/2020	No	Off Akaloa
4		750	Anahulu Lane	900	5	150		2019/2020	No	150 Density
4		200	Oah Ct	200	3	67		2019/2020	No	Off Akaloa
Total		13531		Homes Paved	98					
WD/CT	2.56			Homes with Improved Access	20					
CI										
Total	2.56									

2.56 miles of Committed Roads Under 2019-2024 Road Plan

Proposed Road Projects – Oct 2020 / Sep 2021

October 2020 - September 2021 (Year 2) Locked

Unit	Collector Road	Total Paved	Street	Length of Unpaved Road Measured by Feet	Homes	Feet Between Homes Being Paved	Home Density of Roads To Be Paved; serviced	Previous 5 Year Planned Date to Pave	Bus Route Y/N	Comments
1	Feeder	700	Kawela	700	3	233	143	2019/2020	No	Off Kamakoa
1		200	Mahina (W. Lai)	200	4	50		2019/2020	No	
1		550	Lihue (E. Lai)	550	3	183		2019/2020	No	Off Kawela
1		830	E & W Kamoi	830	8	104		2019/2020	No	Off Kawela
4		3150	Kaelepulu Dr	5350	19	166		2019/2020	No	Akaloa, not the 2200 from MokuManu. Between Akaloa &
4		800	Keaau Ct	800	5	160		2021/2022		Off Wahane
4	Feeder	1250	Nanakuli Dr	1250	5	250	205	2021/2022	No	Off Wahane
		400	Kaupa Ct	400	2	200				
Total		7880		Homes Paved	49					
WD/CT	1.49			Homes with Improved Access	0					
CI										
Total	1.49									
			CATCH UP YEAR							

1.49 miles of Committed Roads Under 2019-2024 Road Plan

Proposed Road Projects – Oct 2021/ Sep 2022

October 2021 - September 2022 (Year 3 LOCKED)

Unit	Collector Road	Total Paved	Street	Length of Unpaved Road Measured by Feet	Homes	Feet Between Homes Being Paved	Home Density of Roads To Be Paved; serviced	Previous 5 Year Planned Date to Pave	Bus Route Y/N	Comments
1		1030	Honopu Dr	1030	2	515				Connects Mauna Kea to Kula Ct
1		350	Kula Ct	350	4	88	159			Added
1		530	Keo Kea	530	6	88				Added
1		760	Keamuku Ct	760	4	190				Added
1		360	Ewa Ct	360	1	360	204			Added to get Keanmuku Ct
2	Feeder	1000	Onini	1000	4	250	270	2021/2025	No	Off Kaanapali
2		350	Kolo Ct	350	1	350				
2		2300	Kipahulu	3900	12	192		2020/2021		Pave entire road
2		2430	Kahalulu	3150	14	174		2021/2022		Pave between Kainalu & Nakalele
2		450	Okoe Ct (East)	450	3	150				
2		1200	Koali	1200	4	300		2021/2023	No	Between Kaanapali & Alele For Egress
2		1950	Pukoo	1950	7	279		2021/2022		Between Kaanapali & Alele For Egress
2		750	Nakalele Lane	750	3	250				May Need to Move Back - need estimate
Total		13460								
WD/CT	2.55			Homes Paved	65					
CI										
Total	2.55									

2.55 miles of Newly Committed Roads Under 2019-2024 Road Plan¹⁷

Proposed Road Projects – Oct 2022/Sep 2023

October 2022 - September 2023 (Year 4 New Plan)

Unit	Collector Road	Total To Be Paved	Street	Length of Unpaved Road Measured by Feet	Homes	Feet Between Homes Being Paved	Avg Home Density of Roads to be Paved;	Previous 5 Year Planned Date to Pave	Bus Route Y/N	Comments
2		2090	Koolua	2090	7	299		2019/2020	No	Off Awehi Lane
2		2,200	Haleakala Dr	2200	2	1100				Finish Off Area
2		650	Laau Ct	650	4	163				Finish off area
5		1300	Kikipua	1300	9	144				Newly Qualified
4 & 5		3100	Waipahoehoe Dr	3100	15	207				
4		2550	Mokuleia Cr	2550	9	283		2018/19	No	Off Akaloa. Pave full Circle
5		2700	Nene	2700	10	270				Was W. Kokekole
4		950	Mokolea Lane	950	3	317				Connects Akaloa & Nanakuli
Total		15540		15540						
WD/CT	2.94			Homes Paved	59					
CI				Homes with improved Access	0					
Total	2.94									

Future Roads that Qualify, pending inclusion into the plan

Future Roads that Qualify Under Home Density Rules											
Unit		Collector Road	Total Paved	Street	Length Ft	Homes	Feet Between Homes	Average using all roads serviced by	Initial Year Planned	Bus Route Y/N	Comments
5			2175	Kahana	2175	6	363			No	
5			2650	Kawainui	2650	8	331			No	Off N. Wahane
2			2700	Wainee	2700	7	386			No	Off Awehi Lane
5			2350	Kamaiki	2350	4	588			No	
2			2500	Molokini	2500	6	417			No	Off Awehi Lane
2			1770	Keneka (Was Wahane west of washout)	1770	4	443				Not connected to County Road
4			4000	Hanauma Dr	4000	5	800				Not connected to County Road
2			3450	Hekili	3450	9	383			No	Off N. Wahane
1			1700	Wiaea Ct E&W & Olia Dr	1700	4	425			No	
4			2550	Wailupe	2550	4	638			No	Off N. Wahane
5			2100	Pauwela	2100	6	350				
1			750	Kailua Lane	750	3	250				
5			760	Keahi Ct	760	3	253				
4			2880	n (previously Koleka	2880	7	411				
3			2529	Keawakapu	2529	4	632				
4			2200	Kaelepulu Dr (South)	2200	3	733			No	Off Awehi Lane
5			2425	Lamalaoa	2425	3	808				Completes Lamalaoa
5			2330	Mokulua Ln (East)	2330	6	388				
Total			41819		Qualified Homes on Unpaved Roads	92					
County	7.92	miles									
City	0.00	miles									
Total	7.92										

Year 5 and Other Qualified

Non-Qualified Roads ~ Future Inclusion in Plan – Page 1

Roads to Be Completed After Home Density Roads Completed (or fit in where plausible)

Unit	Collector Road	Total Paved	Street	Length Ft	Homes	Feet Between Homes	Average roads serviced by feeder	Initial Year Planned	Bus Route Y/N	Comments
1			Koa Ct	650	0	N/A				< 3 homes
2			Llio Court	100	1	100				< 3 homes
2			Puu Ct	280	2	140				< 3 homes
4			Kai Ct	150	1	150				< 3 homes
1			Koko Lane	330	0	N/A				< 3 homes
5			Puu Kaua Ct	350	2	175				< 3 homes
5			Mokuauia Ct	360	2	180				< 3 homes
5			Halawa Ct	200	1	200				< 3 homes
2			Iao Ct	400	2	200				< 3 homes
4			Kaupa Ct	400	2	200				< 3 homes
5			Kipapa Ct	420	2	210				< 3 homes
1			Lae Ct	220	1	220				< 3 homes
2			Katao Ct	450	2	225				< 3 homes
5			Kalihi Ct	250	1	250				< 3 homes
4			Pali Ct	250	1	250				< 3 homes
5			Waialea Ct	320	1	320				< 3 homes
1			Kouli Ct	350	1	350				< 3 homes
2			Pulehu Ct	350	1	350				< 3 homes
2			Kolo Ct	350	1	350				< 3 homes
4			Aiea Ct	400	1	400				< 3 homes
5			Kahuku Ct	400	1	400				< 3 homes
5			Hilea Ct	800	2	400				< 3 homes
2			Moku Ct	450	1	450				< 3 homes
5			MoKoolii Ct	550	1	550				< 3 homes
1			Kohala Lane	700	1	700				< 3 homes
2			Wahane - E of Akaloa	1406	2	703				< 3 homes
5			Loke	1800	2	900				< 3 homes
4			Palikea Cr	1900	2	950				
4			Kaawa Lane West	1911	2	956				< 3 homes
1			Aloha	2250	2	1125				< 3 homes
1			Hulu Ln	1150	1	1150				< 3 homes
5			Keomuku Ln	1500	1	1500				< 3 homes
5			Heleakala Dr	2200	1	2200				< 3 homes
4			Helemano Dr	3300	1	3300				< 3 homes
5			Ahupu Lane	1150	0	N/A				< 3 homes
2			Alau Ct	160	0	N/A				< 3 homes
2			Auau	200	0	N/A				< 3 homes
5			Kahana E	1450	0	N/A			No	Off Awehi Lane
5			Diamond Head Dr	3360	0	N/A				< 3 homes

Non-Qualified Roads ~ Future Inclusion in Plan – Page 2

2			Eke	200	0	N/A		< 3 homes
2			Hana Ct	250	0	N/A		< 3 homes
5			Hawaii Ct	200	0	N/A		< 3 homes
5			Honolulu Ln	230	0	N/A		< 3 homes
5			Howi Ln	350	0	N/A		< 3 homes
5			Huula Ct	450	0	N/A		< 3 homes
5			Kaaka Dr	300	0	N/A		< 3 homes
5			Kaawa Lane	2700	0	N/A		< 3 homes
4			Kaiwi Ct	500	0	N/A		< 3 homes
4			Kaukonahua Lane	4300	0	N/A		< 3 homes
5			Kawanui Dr	950	0	N/A		< 3 homes
5			Keehi Ct	150	0	N/A		< 3 homes
3			Koele	900	0	N/A		< 3 homes
5			Koolau ct	250	0	N/A		< 3 homes
1			Lanai Ct	760	1	760		< 3 homes
5			Lanikai	450	0	N/A		< 3 homes
3			Lipoa	450	1	450		< 3 homes
2			Lopa ct	160	0	N/A		< 3 homes
5			Makua Ct	240	0	N/A		< 3 homes
2			Mala Ct	240	0	N/A		< 3 homes
1			Maue Ct	690	0	N/A		< 3 homes
2			Nuu Ct	190	0	N/A		< 3 homes
1			Okoe Ct (West)	950	0	N/A		< 3 homes
2			Otani Ct	600	0	N/A		< 3 homes
2			S. Manawianui	500	0	N/A		< 3 homes
4	**Special Circumstance**		Ulupau	1500	1	1500		< 3 homes
5			Wahane Lane	750	0	N/A		< 3 homes
5			Waialua Ct	550	0	N/A		< 3 homes
2			Waihii Ct	180	0	N/A		< 3 homes
4			Waikiki	1600	0	N/A		< 3 homes
5			Wailua	550	0	N/A		< 3 homes
5			Hoku	400	0	N/A		< 3 homes
5			Waimanalo Ln	2850	0	N/A		< 3 homes
5			Waipio ct	220	0	N/A		< 3 homes
1			Makaha East Mauna Kea to Aloha Ln	1100	0	N/A		< 3 homes
Total			Feet of Street	59877	48	1247		
			Miles to Be Pavced	11.3				



THANK YOU

Volunteers From Road Committee

Commissioner Hamner from Bastrop County Precinct 1

Trey Job from City of Bastrop

Tyler Walsh with BCWCID#2

BEFCO & County Engineering

& ALL Your Crews

For Your Tremendous Cooperation & Teamwork

TVPOA For Donations Towards Materials