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March 29, 2001

Mr. Tom Gerlach

Dear Mr. Gerlach:

Well Completion Report for Well No. 5424-09

We received the corrected as-built drawing for your Well Completion Report Part II for the Spreckelsville-Gerlach Well (Well No. 5424-09) on March 19, 2001 and acknowledge that it is complete. With this transmittal, your permitting requirements for this well are complete.

If you have any questions, please contact Charley Ice of the Commission staff at 587-0251 or toll-free at 984-2400, extension 70251.

Sincerely,

[Signature]

LINNEL T. NISHIOKA
Deputy Director

Cl:ky

C. Wailani Drilling Company
1. **Pump Tests Check (special condition of PIP? Yes/No)**
   - Glenn Bauer (initial if yes)
   - Yes/No
   - If no, describe deficiency
   - Step-Drawdown Test:
     - followed WCPI Stds
     - analysis attached
     - proposed pump cap o.k.
   - Aquifer Pump Test:
     - followed WCPI Stds
     - T & S analysis attached
   - Well Interference:
     - estimated steady-state drawdown at 1-mile radius is ________ ft.
     - analysis attached
   - Stream Surface Water Impacted:
     - data complete
     - followed WCPI Stds
     - well database updated

2. **Pump Installation Check**
   - Mitch Ohye (initial)
   - data complete
   - followed WCPI Stds
   - well database updated

3. **Charley/lenore/Ryan**
   - (initial) take action based on above analysis

4. Roy (initial) check

5. **Susan Subia**
   - (initial) finalize

6. **Linnel**
   - (initial) signature

7. Charley/lenore/Ryan File

**Gm 5424-09.ack**

**3/20/01**

**4/2/01**

**What about 42' depth**

hit water on as built/ Mitch

They drill below that "blue rock" layer? Mistake is for real?

so it is for real then?

before they hit water, it's under pressure, so clarify w/ Mike before we accept.
Mr. Tom Gerlach  
P.O.Box 1111  
Ha'iku, Maui, HI 96708

Dear Mr. Gerlach:

Well Completion Report for Well No. 5424-09

We have received your Well Completion Report Part II for the Spreckelsville-Gerlach Well (Well No. 5424-09). However, matters which must be addressed before we accept your report as complete are as follows:

1. The as-built drawing should be completed and show all elevations.

We are returning transmitted copies of the well completion report to the driller for clarification.

We are requiring a response to the above item(s) within sixty (60) days of this letter's date. Failure to do so may result in fines of up to $1000 per day.

If you have any questions, please contact Charley Ice of the Commission staff at 587-0251 or toll-free at 974-4000 (Hawaii), 274-3141 (Kauai), 984-2400 (Maui), or 1-800-468-4644 (Lanai & Molokai).

Sincerely,

LINNEL T. NISHIOKA  
Deputy Director

Cl:ky  
c. Wailani Drilling Company
**Sprecklesville Gerlach Well**  
**State Well-#5424-09**  
**Elevation 28.41 ft, m.s.l. S.W.L. 2.11 ft**

**Well Log Drawing**  
11/1/99

---

**深度（ft）**

- 0
- 5
- 10
- 15
- 20
- 25
- 30
- 35
- 40
- 45
- 50
- 55
- 60
- 65
- 70
- 75
- 80
- 85
- 90
- 95
- 100
- 105
- 110
- 115
- 120
- 125
- 130

- 2'x2'x6" concrete slab @ 27.91 msl
- 3 hp. control box
- 2 in. flowmeter on 2 in. galv. column pipe
- Well head elev. 28.41 msl
- Ground elev. @ 27.41
- Cinders (red and black)

**Total Well Depth 50 ft.**

- Hit water at 42 ft.
- Chlorides 400 p.p.m.

*Note: not drawn to scale*
9. AS-BUILT PUMP SECTION (Please attach as-built if different from diagram provided below)

Bench mark elevation surveyed to nearest 0.01 ft. = 27.91 ft. mean sea level (1)

Elevation of top of chase tube = 28.41 ft. mean sea level

Pump intake depth = 34 ft. (referenced to bench mark)

Chase tube depth = 34 ft. (referenced to bench mark)

If airline installed, bottom of airline elevation = N/A ft. mean sea level

26.3 S.W.L from top of chase tube
Mr. Tom Gerlach
P.O. Box 1111
Ha'iku, Maui, HI 96708

Dear Mr. Gerlach:

Well Completion Report for Well No. 5424-09

We have received your Well Completion Report Part II for the Spreckelsville-Gerlach Well (Well No. 5424-09). However, matters which must be addressed before we accept your report as complete are as follows:

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If you have any questions, please contact Charley Ice of the Commission staff at 587-0251 or toll-free at 974-4000 (Hawaii), 274-3141 (Kauai), 984-2400 (Maui), or 1-800-468-4644 (Lanai & Molokai).

Sincerely,

LINNEL T. NISHIOKA
Deputy Director

Ct:ky

c. Wallani Drilling Company
Mr. Tom Gerlach  
P.O.Box 1111  
Ha'iku, Maui, HI 96708

Dear Mr. Gerlach:

Well Completion Report for Well No. 5424-09

We have received your Well Completion Report Part II for the Spreckelsville-Gerlach Well (Well No. 5424-09). However, matters which must be addressed before we accept your report as complete are as follows:

1. The as-built drawing should be completed and show all elevations.

We are returning transmitted copies of the well completion report to the driller for clarification.

We are requiring a response to the above item(s) within sixty (60) days of this letter's date. Failure to do so may result in fines of up to $1000 per day.

If you have any questions, please contact Charley Ice of the Commission staff at 587-0251 or toll-free at 974-4000 (Hawaii), 274-3141 (Kauai), 984-2400 (Maui), or 1-800-468-4644 (Lanai & Molokai).

Sincerely,

LINNEL T. NISHIOKA  
Deputy Director

Cl:ky  
c. Wailani Drilling Company
Mr. Mike Robertson  
Wailani Drilling Company  
655 Kulike Road  
Ha‘iku, Maui HI 96708

Dear Mr. Robertson:

Well Completion Reports and As-Built Drawings

Thank you for recently submitting:

- the signed copy of the Pump Installation Permit for the Peahi-Johnson Well (Well No. 5515-04), along with a second copy of the Well Completion Report Part 1 (well construction)
- the Well Completion Report Part 2 (pump installation) for the Mahinahina-Shoemaker Well (Well No. 5841-03), and
- the Well Completion Report Part 2 for the Spreckelsville-Gerlach Well (Well No. 5424-09)

We are returning the Well Completion Reports with this letter to highlight irregularities in the completing of these forms. Please review your records and resubmit with corrections as necessary. Enclosed also is the current as-built drawing form to aid in illustrating the points below. Attached also are copies of acknowledgement letters sent to the permittees, as required.

a. The as-built drawing for well construction should show three elevations, reflecting the required survey:

1. ground elevation, or grade (measured to approximate 0.1 feet, msl)
2. benchmark on concrete pad (measured to 0.01 feet, msl)
3. top of casing (usually measured up from benchmark, to 0.01 feet, msl; however, it is acceptable to survey to a mark on the casing, and cut the casing to a convenient height)
One of these is your official "reference point" – probably top of casing. Please modify your computer drawing to reflect the features shown on the form. The measurement on the as-built should be the same as on the survey and on the WCR form. We frequently find they are different.

b. *Initial water level* is the elevation where water was first encountered when drilling, probably measured from a reference point on the rig, but then transferred to one of the indicated three elevations. You do not always clearly indicate from which point you are measuring this initial water level. The measurement reported on the as-built drawing and on the fill-in form do not always match.

c. The *static water level* is the non-pumping water level elevation in the wellbore when drilling is complete and before pumping, carefully measured (usually from the top of the casing) and referenced to mean sea level (msl). In many cases, this will be different than the depth where water is initially encountered, as the water may be constrained under natural geologic conditions and released once the wellbore reaches it.

d. In the WCR Part II (pump installation), the pump intake depth and the bottom of the monitor tube, or chase tube depth, are measured referenced to the benchmark.

e. Please be sure to complete all dates required on the form, and have them match.

f. Please indicate the manufacturer's rated pump capacity, and the total head against which this capacity is pumped. The pump installation application should reflect the anticipated installed capacity, not the eventual withdrawal capacity, and if the pump test is run with fitted pipe versus open pipe, that should be noted also.

g. We need to coordinate a date on which we can be present during a pump test you perform, to validate your measuring techniques.

If you have any questions, please contact Charley Ice of the Water Commission staff at 587-0251 or toll-free at 984-4644, extension 70251.

Sincerely,

LINNEL T. NISHIOKA
Deputy Director

Cl:ky
Enclosures
1. **Pump Tests Check** (special condition of PIP? Yes/No) Glenn Bauer, (initial if yes)
   - Yes
   - No
   - If no, describe deficiency

   **Step-Drawdown Test:**
   - followed WCPI Stds
   - analysis attached
   - proposed pump cap o.k.

   **Aquifer Pump Test:**
   - followed WCPI Stds
   - T & S analysis attached

   **Well Interference:**
   - estimated Steady-State drawdown at 1-mile radius is ______ ft.
   - analysis attached

   **Stream Surface Water Impacted:**
   - If yes, identify most probable stream

2. **Pump Installation Check** Mitch Ohye, (initial) 1-29-61
   - data complete
   - followed WCPI Stds
   - well database updated

3. Charley/Lenore/Ryan, (initial) take action based on above analysis

4. Roy, (initial) check

5. Susan Subia, (initial) finalize

6. Linnel, (initial) signature

7. Charley/Lenore/Ryan, File
Mr. Tom Gerlach  
P.O. Box 1111  
Haiku, HI 96708

Dear Mr. Gerlach:

Pump Installation Permit  
Spreckelsville-Gerlach Well (Well No. 5424-09)

Enclosed are two (2) originals of your approved Pump Installation Permit for the captioned well(s) that authorize permanent pump installation work for your well(s). As part of the Chairperson's approval, the following special conditions were added and are part of your permit under Permit Condition 11:

**Special Conditions**

1. If the elevation benchmark needs to be altered, the permittee, well operator, and/or well owner shall ensure that the benchmark is transferred (or the well resurveyed) and documentation of the new benchmark shall be submitted to the Commission within sixty (60) days after the pump is installed.

The permittee, well operator, and/or well owner are responsible for all conditions of the permit. Be advised that you may be subject to fines of up to $1000 per day for any violations of your permit conditions starting from the permit approval date.

Please sign and have the contractor sign both permit originals and return one for our files. A copy of your water use report form is enclosed for your use.

Except for the monthly water use report form, please provide copies of all the information in this packet to your pump installation contractor.

Finally, this letter is notice that we have accepted your Well Completion Report - Parts I as complete.

If you have any questions, please call Charley Ice of the Commission staff at 587-0251 or toll-free at 984-2400, extension 70251.

Aloha,

TIMOTHY E. JOHNS  
Chairperson

Enclosure

c: Wailani Drilling Company
PUMP INSTALLATION PERMIT
Sprockelsville-Gerash Well, Well No. 5424-08

In accordance with Department of Land and Natural Resources, Commission on Water Resource Management's Administrative Rules, Section 13-186, titled "Water Use, Waits, and Stream Diversion Works", this document permits the pump installation for Sprockelsville-Gerash Well (Well No. 5424-08) at Sprockelsville, Waialua, Oahu, TMK 5-6-2-192, subject to the Hawaii Wall Construction & Pump Installation Standards (12/20/87) which include but are not limited to the following conditions:

1. The Chairperson to the Commission on Water Resource Management (Commission), P.O. Box 921, Honolulu, HI 96808, shall be notified, in writing, at least two (2) weeks before any work covered by this permit commences and staff shall be allowed to inspect installation activities in accordance with §13-155-15, Hawaii Administrative Rules.

2. The pump installation permit shall be for installation of a 60 gpm capacity, or less, pump in the well.

3. The pump, well operator, and/or well owner shall provide and maintain an approved water or other appropriate means for measuring and reporting withdrawals and water levels, and appropriate devices or means for measuring chlorides and temperature. These data shall be measured monthly and reported to the Commission on a monthly basis, on forms provided by the Chairperson (attached).

4. The proposed use shall not adversely affect existing or future legal uses of water in the area, including any surface water or established in-stream flow standards. This permit or the authorization to pump water from a well shall not constitute a determination of the value of water rights. The permittee, well operator, and/or well owner are notified that the quantity of water taken from the well may be reduced by the Commission in the future. This permit is not a commitment that the pump capacity permitted here or even some lesser amount is guaranteed in the future.

5. The permittee, well operator, and/or well owner shall complete and submit as-built drawings and Part II - Permanent Pump Installation Report of the Well Completion Report (attachment) to the Chairperson within sixty (60) days after completion of work.

6. The permittee, well operator, and/or well owner shall comply with all applicable laws, rules, and ordinances, and non-compliance may be grounds for revocation of this permit.

7. The pump installation permit application is incorporated into this permit by reference and is subject to the Hawaii Wall Construction & Pump Installation Standards (12/20/87). If the HWCCS are not followed and as a consequence water is wasted or contaminated, a lien on the property may result.

8. The permit may be revoked if work is not started within six (6) months after the date of approval or if work is suspended or abandoned for six (6) months, unless otherwise specified. The work proposed in the pump installation permit application shall be completed within two (2) years from the date of permit approval, unless otherwise specified. The permit may be extended by the Chairperson upon a showing of good causes and good-faith performance. A request to extend the permit shall be submitted to the Chairperson no later than three (3) months prior to the date the permit expires. If the commencement date is not met, the Commission may revoke the permit after giving the permittee, well operator, and/or well owner notice of the proposed action and an opportunity to be heard.

9. If the well is not to be used it must be properly capped. If the well is to be abandoned then the permittee, well operator, and/or well owner shall apply for a well abandonment permit in accordance with §13-155-12(9) prior to any well sealing or plugging work.

10. The permittee, its successors, and assigns shall indemnify, defend, and hold the State of Hawaii harmless from and against any loss, liability, claim, or demand for property damage, personal injury, or death arising out of any act or omission of the applicant, assigns, officers, employees, contractors, and agents under this permit or relating to or connected with the granting of this permit.

11. Special conditions in the attached cover sheet or tabular matter are incorporated herein by reference.

Date of Approval: September 27, 2000
Expiration Date: September 27, 2002

TIMOTHY E. JOHNS, Chairperson
Commission on Water Resource Management

I have read the conditions and terms of this permit and understand them. I agree to comply with these conditions as a prerequisite and underlying condition of my ability to proceed and understand that I shall not commence work until I am notified the permit issued has signed, dated, and returned the permit to the Commission. I also understand that non-compliance with any permit condition may be grounds for revocation and fines of up to $1000 per day starting from the permit date of approval.

Permittee's Signature: Thomas D. Gerash
Printed Name: Thomas D. Gerash, Firm or Title: Land Owner
Date: 11/21/00

Installer's Signature: Mike Robertson
Printed Name: Mike Robertson, C-208, Lic # 72115
Date: 11/06/00

Please sign both copies of this permit, return one to the Chairperson, and retain the other for your records.

Attachments

USGS
Department of Health's Safe Drinking Water & Wastewater Branch
Main Department of Water Resources
PART II.
(Permanent) Pump Installation Report

20. Pump Installation Company: Wailani Drilling Inc
21. Name of person performing work: Mike Baker
22. Date Pump Installation Completed: 1/11/99
23. Pump Installation:
   Submersible
   Pump Type, Make, Serial No.: Gemini, DTM, 40532-5
   Motor Type, H.P., Voltage, rpm: Franklin, 3 HP, 220V, 3450 rpm
   Depth of Pump Intake Setting: 34 ft. below MSL, which elevation is 20.41 ft.
   Depth to bottom of pipeline: 34 ft. below MSL, which elevation is 20.41 ft.
   Pumping Head: 140 ft.
   Type of flow meter: Damar Meter, which measures in GPM

24. As-built drawings attached: Yes

25. Other remarks/comments: (See below)

Pump Installation Contractor (print): Wailani Drilling C-57 Lic. No. 20115

Signature: [Signature]
Date: 1/11/99

Applicant (print): Tom Geelhoft

Signature: [Signature]
Date: 1/11/99

8.(cont'd) DRILLER'S LOG (cont'd):

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</table>

- Survey attached - Wed.
Wailani Drilling Company

Lic. # C20115

Mike Robertson  655 Kulike Road  Haiku, Maui, Hawaii 96780
Ph. 808 572-2673  Fax 572-0925  Cellular 264-7079

Tom Gerlach Well Log

drawing*  11/1/99

Sprecklesville Gerlach Well  State Well- #5424-09  Elevation 28.30 ft., m.s.l.  S.W.L. 2.11 ft.

--- Diagram Content ---

Well head elev. 28.41

2' x 2' concrete slab

red clay

1 in. PVC tube for monitor to 34 ft.

blue rock (basalt)

Static water level 26.3 ft.

weathered basalt

cinders (red and black)

2 in. flowmeter on 2 in. galv. column pipe

#12-3 pump cable

6 in. PVC louvered casing 30-50 ft.

3hp 60 gpm @ 150 ft. Grundfos submersible. Intake at 34 ft.

chlorides 400 p.p.m.

hit water at 42 ft. S.W.L. 26.30

Total Well Depth 50 ft.

WELL HEAD EL. = 28.41

Depth to Top of Water = 26.30

Water, Below

WELL HEAD

\[ \text{STATIC WATER LEVEL (WATER SPREADING)} \]

\[ \text{WELL HEAD ABove sea level.} \]

*Note: not drawn to scale
Mr. Tom Gerlach  
P.O. Box 1111  
Haiku, HI 96708

Dear Mr. Gerlach:

Pump Installation Permit  
Spreckelsville-Gerlach Well (Well No. 5424-09)

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**Special Conditions**

1. If the elevation benchmark needs to be altered, the permittee, well operator, and/or well owner shall ensure that the benchmark is transferred (or the well resurveyed) and documentation of the new benchmark shall be submitted to the Commission within sixty (60) days after the pump is installed.

The permittee, well operator, and/or well owner are responsible for all conditions of the permit. Be advised that you may be subject to fines of up to $1000 per day for any violations of your permit conditions starting from the permit approval date.

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Except for the monthly water use report form, please provide copies of all the information in this packet to your pump installation contractor.

Finally, this letter is notice that we have accepted your Well Completion Report - Parts I as complete.

If you have any questions, please call Charley Ice of the Commission staff at 587-0251 or toll-free at 984-2400, extension 70251.

Aloha,

TIMOTHY E. JOHNS  
Chairperson

Enclosure

c: Wailani Drilling Company
PUMP INSTALLATION PERMIT
Spreckelsville-Gerlach Well, Well No. 5424-09

In accordance with Department of Land and Natural Resources, Commission on Water Resource Management's Administrative Rules, Section 13-168, entitled "Water Use, Wells, and Stream Diversion Works", this document permits the pump installation for Spreckelsville-Gerlach Well (Well No. 5424-09) at Spreckelsville, Wailuku, Maui, TMK 3-8-2:102, subject to the Hawaii Well Construction & Pump Installation Standards (1/23/97) which include but are not limited to the following conditions:

1. The Chairperson to the Commission on Water Resource Management (Commission), P.O. Box 621, Honolulu, HI 96809, shall be notified, in writing, at least two (2) weeks before any work covered by this permit commences and staff shall be allowed to inspect installation activities in accordance with §13-168-15, Hawaii Administrative Rules.

2. The pump installation permit shall be for installation of a 60 gpm capacity, or less, pump in the well.

3. The permittee, well operator, and/or well owner shall provide and maintain an approved meter or other appropriate means for measuring and reporting withdrawals and water levels, and appropriate devices or means for measuring chlorides and temperature. These data shall be measured monthly and reported to the Commission on a monthly basis, on forms provided by the Chairperson (attached).

4. The proposed use shall not adversely affect existing or future legal uses of water in the area, including any surface water or established instream flow standards. This permit or the authorization to pump water from a well shall not constitute a determination of correlative water rights. The permittee, well operator, and/or well owner are notified and by this provision understands that the quantity of water taken from the well could be reduced by the Commission in the future. This permit is not a commitment that the pump capacity permitted here or even some lesser amount is guaranteed in the future.

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6. The permittee, well operator, and/or well owner shall comply with all applicable laws, rules, and ordinances, and non-compliance may be grounds for revocation of this permit.

7. The pump installation permit application is incorporated into this permit by reference and is subject to the Hawaii Well Construction & Pump Installation Standards (1/23/97). If the HWCPIS are not followed and as a consequence water is wasted or contaminated, a lien on the property may result.

8. The permit may be revoked if work is not started within six (6) months after the date of approval or if work is suspended or abandoned for six (6) months, unless otherwise specified. The work proposed in the pump installation permit application shall be completed within two (2) years from the date of permit approval, unless otherwise specified. The permit may be extended by the Chairperson upon a showing of good cause and good-faith performance. A request to extend the permit shall be submitted to the Chairperson no later than three (3) months prior to the date the permit expires. If the commencement date is not met, the Commission may revoke the permit after giving the permittee, well operator, and/or well owner notice of the proposed action and an opportunity to be heard.

9. If the well is not to be used it must be properly capped. If the well is to be abandoned then the permittee, well operator, and/or well owner must apply for a well abandonment permit in accordance with §13-168-12(f) prior to any well sealing or plugging work.

10. The permittee, its successors, and assigns shall indemnify, defend, and hold the State of Hawaii harmless from and against any loss, liability, claim, or demand for property damage, personal injury, or death arising out of any act or omission of the applicant, assigns, officers, employees, contractors, and agents under this permit or relating to or connected with the granting of this permit.

11. Special conditions in the attached cover transmittal letter are incorporated herein by reference.

Date of Approval: September 27, 2000
Expiration Date: September 27, 2002

TIMOTHY E. JOHNS, Chairperson
Commission on Water Resource Management

I have read the conditions and terms of this permit and understand them. I accept and agree to meet these conditions as a prerequisite and underlying condition of my ability to proceed and understand that I shall not commence work until I and the pump installer have signed, dated, and returned the permit to the Commission. I also understand that non-compliance with any permit condition may be grounds for revocation and fines of up to $1000 per day starting from the permit date of approval.

Permittee's Signature: _______________________________ Date: __________
Printed Name: ___________________________ Firm or Title: ___________________________

Installer's Signature: ___________________________ C-57, C-57a, or A License #: __________ Date: __________
Printed Name: ___________________________ Firm or Title: ___________________________

Please sign both copies of this permit, return one to the Chairperson, and retain the other for your records.

Attachments

USGS
Department of Health/Safe Drinking Water & Wastewater Branch
Maul Department of Water Supply
Wailani Drilling Company

C-57, C-57a, or A License #: __________ Date: __________
Printed Name: ___________________________ Firm or Title: ___________________________

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Wailani Drilling Company
PUMP INSTALLATION PERMIT
Spreckelsville-Gerlach Well, Well No. 5424-09

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10. The permittee, its successors, and assignees shall indemnify, defend, and hold the State of Hawaii harmless from and against any loss, liability, claim, or demand for property damage, personal injury, or death arising out of any act or omission of the applicant, assigns, officers, employees, contractors, and agents under this permit or relating to or connected with the granting of this permit.

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Permittee's Signature: 
Printed Name: Thomas Gerlach Firm or Title: 
Date: 11/1/01

Installer's Signature: 
Printed Name: Mike Roberts C50C-576 or a License #: 20115 Date: 1/30/99

Please sign both copies of this permit, return one to the Chairperson, and retain the other for your records.

Attachments

USGS
Department of Health's Safe Drinking Water & Wastewater Branch
Maui Department of Water Supply
Wailani Drilling Company
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PLEASE: See Me
Review & Comment
Take Action
Type Draft
Type Final
File
Xerox copies
**Commission on Water Resource Management**

**FROM:** LINNEL  
**DATE:** SEP 27, 2000  
**SUSPENSE DATE:**

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**Note:**
- OK to accept W/ER for these wells yet?
- Originals came in 8/22
- Please don't forget to route acceptance letters to me. Thanks.
- 1. 9616-04 Honig 7
   - Waiting for SurJET
   - LTR. SENT 9/28-00
To: Charlie Ice  
For: Water Commission  
From: Mike Robertson  

9/25/00

Re: Letter from Water Commission Dated Sept. 21, 2000

Thank You for helping me to wrap up all of the loose ends on all of the past well projects. In answer to your questions in the letter:

5616-04 Honigs pumping rate was 25 gpm. My oversight that it was not on the form I apologize. I mailed you 2 copies of WCR-1 one copy was faxed from Frederick with his signature and one was easier to read without his signature and it was in front of the signed copy.

5424-09 Gerlach well log showed water bearing formation was encountered at 42 ft. but the static water level is 26.30 or 2.11 ft. msl. I believe this has caused some confusion on other well logs also. With this fax is a copy of Gerlach's corrected WCR-1, corrected front page on pump test form and the survey Certificate. Hard copies will follow in the mail.

5841-03 Shoemaker did take a long time to locate his survey which was actually done by the same surveyor at the same time that Mahinahina-McDonald Well was done. He was however in critical condition for a period of time during this process in the hospital on the mainland and did not know if he was even going to live. I know he was not intentionally neglecting his responsibility as he is normally a very prompt person unlike some of my past clients. I did however find a copy of a fax in McDonald's file which I faxed to you on 5/17/98 asking to take advantage of the new declaratory ruling. I never got a response but assumed the request had been filed as I had also had no response from other notice to start letters which I have sent also.

With this letter also is the corrected map of wells on Kulike Rd. There are 2 old wells in this area which I did not drill. One on lot # 48 and one is over on Haumana Rd. I believe it is on lot # 41. Everything else on this map should be right. I hope this clears up any questions please call if you need further explanation.

Thank You:  
Mike Robertson

Certified By And A Member of The National Ground Water Association
**WELL COMPLETION REPORT**

**Part I. Well Construction & Part II. Permanent Pump Installation**

**Instructions:** Please print or type and submit completed report within 60 days after well completion to the Commission on Water Resource Management, P.O. Box 821, Honolulu, Hawaii 96802. An as-built drawing of the well and chemical analysis should also be submitted. For assistance call the Commission Regulation Branch at 967-0226, or 1-800-454-0441 Extension 7925.

1. **State Well No.:** 5424-09  
   **Well Name:** Sprecklesville-Gartlan  
   **Island:** Maui

2. **Location/Address:** Sprecklesville, Wailuku  
   **Tax Map Key:** 3-8-2-102

### Part I. Well Construction Report

3. **Drilling Company:** Wailani Drilling Inc.
4. **Name of driller who performed work:** Mike Robertson
5. **Type of rig/construction:** Air Rotary
6. **Date(s) Well Construction and pump tests (if any) completed:** 10/19/99
7. **GROUND ELEVATION** (referred to mean sea level, msl): 28.2 ft.
   - **Well Bench Mark (description/location):** 12.1 x 21.0 Elevation(msl): 28.1 ft.
8. **DRILLER’S LOG:** Please attach geologic log (if available or if required by permit)
   - **Depth (ft.)**  
     - **Rock Description, Water Level, Dates, etc.**
   - **Depth (ft.)**  
     - **Rock Description, Water Level, Dates, etc.**

<table>
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<th>Rock Description, Water Level, Dates, etc.</th>
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<td><strong>Blue Rock</strong></td>
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<td><strong>Underwater horsting</strong></td>
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9. **Total depth of well below ground:** 50 ft.
10. **Hole size:**  
    - 12.5 inch dia. from 0 ft. to 50 ft. below ground
    - 10 in. I.D. x .25 in. wall solid section to 30 ft. below ground
    - 6 in. I.D. x .25 in. wall perforated section to 50 ft. below ground
11. **Casing installed:**  
    - 10 in. I.D. x .25 in. wall solid section to 30 ft. below ground
    - 6 in. I.D. x .25 in. wall perforated section to 50 ft. below ground
12. **Annulus:**  
    - Grouted from 0 ft. below ground to 25 ft. below ground
    - Gravel packed from 25 ft. below ground to 75 ft. below ground
13. **Initial water level:** 26.3 ft. below ground.
14. **Initial chloride:** 400 ppm
15. **Initial temperature:** 72°F
16. **PUMPING TESTS:** Reference Point (R.P.) used: wellhead, which elevation is 14 ft.
17. **Pump Test Procedures data & graphs (12/17/97 SDPTD & CRPTD Forms) attached?** Yes No
18. **As-built drawings attached?** Yes No
19. **Other remarks/comments:** (On back of this form)

---

**Well Drilling Contractor (print):** Mike Robertson  
**License No.:** C-57  
**Date:** 10/30/99

**Surveyor (print):** KIRK T. TANAKA  
**License No.:** 7223  
**Date:** 9/25/00

**Applicant (print):** THOMAS D. GARTLAN  
**Date:** 4/28/99
### CONSTANT-RATE PUMP TEST DATA

**Pumped Well No.**: 5424-09  
**Pumped Well Name**: Spraklesville  
**Target Q**:  

**Observation well no.**  
**Distance between Obs. & Pumped Well**:  
**Reference pt. for depth to water**: 28.4 ft  
**Static Water Level @ start of test**: 21.11 ft

**Water level measurements by**:  
- Steel tape  
- Pressure transducer  
- Airline

**START TEST**  
**Date**: 10/19/99  
**Time of day**: 7:45 AM

**Flow Meter Reading Start**: 500 gals

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Wailani Drilling Company  Lic. # C20115

Mike Robertson  655 Kulike Road  Haiku, Maui, Hawaii 96708  Tom Gerlach Well Log
Ph. 808 572-2673  Fax 572-0925  Cellular 264-7079  drawing*  11/1/99

Spreklesville Gerlach Well  State Well- #5424-09  Elevation 28.30 ft, m.s.l.  S.W.L. 2.11 ft

*Note: not drawn to scale
September 14, 2000

Mr. Glenn Tremble

Re: Well Easement (SA2A-09)
Lot 2, Kaunol II Subdivision
At Spreckelsville, Maui, Hawaii
TMK: (2) 3-8-02:102

Dear Mr. Tremble:

Pursuant to your request, transmitted herewith is a print of the well easement map and metes and bounds description of the subject easement for your use.

An elevation survey was conducted on the site on September 6, 2000. The elevation of the concrete slab covered by the wooden structure (well) at the westerly corner of Lot 2 above mean sea level is 28.3 feet.

Thank you for the opportunity to perform this work for you.

Should you have any questions or comments, please do not hesitate to call me.

Very truly yours,

Kirk T. Tanaka, P.E., L.S.
President

KTT:sh
Wailani Drilling Company
Lic. # C20115

Mike Robertson  655 Kulike Road  Haiku, Maui, Hawaii 96708
Ph. 808 572-2673  Fax 572-0925  Cellular 264-7079

Tom Gerlach Well Log
Sprecklesville Gerlach Well  State Well- #5424-09  Elevation 28.30 ft, m.s.l. S.W.L 2.11 ft

---

**Depth (ft):**

- 0 ft: Well head elev. 28.41
- 2'x2' concrete slab
- 1 in. pvc pipe for monitor to 24 ft
- Blue rock (basalt)
- Static water level 26.3 ft.
- 3hp control box
- 2 in. flowmeter on 2 in. galv. column pipe
- #12-3 pump cable
- 6 in. pvc louvered casing 30-50 ft.
- 3hp 60 gpm @ 150 ft. Grundfos submersible intake at 34 ft
- Water at 42 ft S.W.L 11/99

**Total Well Depth: 50 ft.**

---

*Note: not drawn to scale*
**CONSTANT-RATE PUMP TEST DATA**

Pumped Well No. 5424-09  
Pumped Well Name Spraklsville  
Target Q gpm  

**Observation well no.**  
Distance between Obs. & Pumped Well ft.  
Reference pt. for depth to water ft. msl  
Static Water Level @ start of test ft. msl  
Top of cas.  

Water level measurements by:  
- [ ] steel tape  
- [ ] pressure transducer  
- [ ] airline

**START TEST**  
Date: 10/19/99  
Time of day: 7:45 Am

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Flow Meter Reading Start: 500 gals
September 14, 2000

Mr. Glenn Tremble

Re: Well Easement
Lot 2, Kaunoa II Subdivision
At Spreckelsville, Maui, Hawaii
TMK: (2) 3-8-02:102

Dear Mr. Tremble:

Pursuant to your request, transmitted herewith is a print of the well easement map and metes and bounds description of the subject easement for your use.

An elevation survey was conducted on the site on September 6, 2000. The elevation of the concrete slab covered by the wooden structure (well) at the westerly corner of Lot 2 above mean sea level is 28.3 feet.

Thank you for the opportunity to perform this work for you.

Should you have any questions or comments, please do not hesitate to call me.

Very truly yours,

[Signature]

Kirk T. Tanaka, P.E., L.S.
President

KTT:sh
State of Hawaii
COMMISSION ON WATER RESOURCE MANAGEMENT
Department of Land and Natural Resources

WELL COMPLETION REPORT

12/17/87 WCR Form

Part I. Well Construction  
Part II. Permanent Pump Installation

Instructors: Please print or type and submit completed report within 60 days after well completion to the Commission on Water Resources Management, P.O. Box 821, Honolulu, Hawaii 96820. An as-built drawing of the well and chemical analysis should also be submitted. For assistance call the Commission's Regulation Branch at 587-0220, or 1-800-453-4444 Extension 70222.

1. State Well No.: 592-29  
   Well Name: Spracklesville-Garisch  
   Island: Maui

2. Location/Address: Spracklesville, Wailuku  
   Tax Map Key: 3-3-2102

PART I. WELL CONSTRUCTION REPORT

4. Name of driller who performed work: Mike Robertson  
5. Type of rig/construction: Air Rotary

6. Date(s) Well Construction and pump tests (if any) completed: 10/19/89

7. GROUND ELEVATION (referred to mean sea level, msl): 28.3 ft.  
   Well Bench Mark (description/location): well head
   Elevation (msl): 28.41 ft.

8. DRILLER'S LOG: Please attach geologic log (if available or if required by permit)

   Depth (ft.)  Rock Description, Water Level, Dates, etc.  Depth (ft.)  Rock Description, Water Level, Dates, etc.
   0 = 30  Acid Clay  38 = 52  Soft weathered Basalt
   20 = 38  Dense Blue Rock  43 to 52  Cliffs in water bearing

   (If more space is needed, continue on back.)

9. Total depth of well below ground: 50 ft.
10. Hole size: 13.5 inch dia. from 0 ft. to 50 ft. below ground

11. Casing installed: (6 in. I.D. x 125 ft. in. well solid section to 30 ft. below ground
    (6 in. I.D. x 125 ft. in. well perforated section to 50 ft. below ground

   Casing Material/Slot Size: 1/4"

12. Annulus:
    Grouted from 0 ft. below ground to 25 ft. below ground
    Gravel packed from 25 ft. below ground to 75 ft. below ground

13. Initial water level: 26.3 ft. below ground  
   Date and time of measurement: 10/19/89 7:45 a.m.

14. Initial chloride: 40 ppm  
   Date and time of sampling: 10/19/89 7:45 a.m.

15. Initial temperature: °F  
   Date and time of measurement: 10/19/89

16. PUMPING TESTS: Resistance Point (R.P.) used: wellhead  
   which elevation is ft.

   (1) Step-Drawdown Test Date: 10/19/89  
      Start water level: 26.3 ft. below R.P.
      End water level: 32.3 ft. below R.P.

   (2) Long-term Aquifer Test Date: 10/19/89  
      Start water level: 26.3 ft. below R.P.
      End water level: 32.3 ft. below R.P.

17. Pump Test Procedures data & graphs (12/17/87 SOPTD & CRPTD Forms) attached: Yes No

18. As-built drawings attached: Yes  No

19. Other remarks/comments: (On back of this form)

Well Drilling Contractor (print): Mike Robertson  
Lic. No.: 2015

Signature: Mike Robertson  
Date: 10/30/89

Surveyor (print): Kirk T. Tanaka  
Lic. No.: 7238-15

Signature: Kirk T. Tanaka  
Date: 10/30/89

Applicant (print): Thomas D. Garisch  
Signature: Thomas D. Garisch  
Date: 11/25/89
Mr. Thomas Gerlach
P.O. Box 1111
Haiku, HI 96708

Dear Mr. Gerlach:

Well Completion Report for Well No. 5429-09

We have received your Well Completion Report Part I for the Sprecklesville-Gerlach (Well No. 5429-09). However, matters which must be addressed before we accept your report as complete are as follows:

- The elevation survey for the reference point at the top of the well must be completed and submitted before we can issue the pump installation permit.

Please respond to the above item(s) within sixty (60) days of this letter's date. Failure to do so may result in fines of up to $1000 per day.

If you have any questions, please contact Charley Ice of the Commission staff at 587-0251 or toll-free at 984-2400, extension 70251.

Sincerely,

LINNEL T. NISHIOKA
Deputy Director

Cl:ss

c: Wailani Drilling Company
Mr. Mike Robertson  
Wailani Drilling Company  
655 Kulike Road  
Haiku, HI 96708

Dear Mr. Robertson:

Thank you for several Well Completion Reports (WCR) received on August 22, 2000:

Well No. 5615-04 (Bock)  
Well No. 3806-03 (Mokulau)  
Well No. 5414-02 (Ulin)  
Well No. 5616-04 (Honig)  
Well No. 5424-09 (Gerlach)  
Well No. 5841-03 (Shoemaker)  
Well No. 5515-04 (Johnson)

The Bock, Mokulau, and Ulin reports are in order. It is understood that surveys for several wells will be forthcoming, and our acknowledgement letters to permittees will remind them that it must be done. There are some unfinished matters for the others:

Well No. 5616-04 (Honig)  
1. Fred Honig needs to sign the WCR.  
2. Please identify the pumpage rate used in the constant rate pump test— that column is blank.

Well No. 5424-09 (Gerlach)  
The initial water level for the Gerlach Well on the Completion Report is different from the one on the as-built drawing.

Well No. 5841-03 (Shoemaker)  
The permanent pump is installed, although no provision was made for that despite the option available. We need to consider Commission action on that violation.
Well No. 5515-04 (Johnson)

In the course of entering this well information into the database, we realized that the location of this and neighbor wells may not be properly numbered. Please help us locate these wells more accurately.

Enclosed is a small TMK base map with a USGS quad acetate overlay, to approximately the same scale. The stream on both is colored for easier viewing. Please mark each well in the correct spot of its parcel with a circled colored "X" on the TMK base.

In the future, using the standard 7.5-minute quads will work better than the 15-minute quads. Also, the regular TMK maps seem to work better than the individual subdivision maps. I've identified the parcels owned by the permittees (2-8-4:___):

Bock: 72       Robertson: 73       Phillips: 74
Trier: 79      Wanner: 80         Johnson: 86

At this point, it appears that our numbers for the Trier Well and the Johnson Well are erroneous (note the USGS grid lines on the overlay, separating Well No. 5515 from 5615).

If you have any questions, please call Charley Ice at 587-0251.

Sincerely,

LINNEL T. NISHIOKA
Deputy Director

CI:ss
Enclosure
WCR 1 Check for Well No. 5424-09 (survey to regulation memo)

1. **Pump Tests Check**  Glenn Bauer (initial)
   
   **Step-Drawdown Test:**
   - Yes  No  If no, describe deficiency
   
   - followed WCPI Stds
   - analysis attached
   - proposed pump cap o.k.
   
   Step test not needed.

   Aquifer Pump Test:
   - followed WCPI Stds
   - T & S analysis attached
   
   Static water measured at 0.3' mcl (??)

   Well Interference:
   - estimated Steady-State drawdown at 1-mile radius is ____ ft.
   - analysis attached
   
   Stream Surface Water Impacted:
   - If yes, identify most probable stream

2. **Construction Check**  Mitch Ohye (initial)
   
   **Yes  No  If no, describe deficiency**
   
   data complete
   - followed WCPI Stds
   - well database updated

   Severely

3. Charley/Lenore/Ryan (initial) take action based on above analysis

4. Roy (initial) check

5. Susan Subia (initial) finalize

6. Linnel (initial) signature

7. Charley/Lenore/Ryan File
Pumping Test analysis
Time-Drawdown-method after
COOPER & JACOB
Confined aquifer

Date: 28.08.2000
Page 1

Project: Sprecklesville-Gerlach
Evaluated by: Glenn Bauer

Pumping Test No. Long Term
Test conducted on: October 19, 1999
Well 5424-09
Discharge 11550.00 ft³/d

Transmissivity [ft²/d]: 3.77 x 10³
Pumping test analysis
Time-Drawdown-method after
COOPER & JACOB
Confined aquifer

Date: 28.08.2000
Page 2

Project: Sprecklesville-Gerlach
Evaluated by: Glenn Bauer

Pumping Test No. Long Term
Well 5424-09
Discharge 11550.00 ft³/d

Test conducted on: October 19, 1999
Specklesville-Gerlach
Distance from the pumping well 1.00 ft

Static water level: 26.30 ft below datum

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### WELL COMPLETION REPORT

**WELL COMPLETION REPORT**

**Part I. Well Construction** & **Part II. Permanent Pump Installation**

**Instructions:** Please print or type and submit completed report within 60 days after well completion to the Commission on Water Resource Management, P.O. Box 621, Honolulu, Hawaii 96809. An as-built drawing of the well and chemical analysis should also be submitted. For assistance call the Commission Regulation Branch at 587-0225, or 1-800-468-4644 Extension 70225.

1. **State Well No.:** 5424-09  
   **Well Name:** Sprecklesville-Geriach  
   **Island:** Maui

2. **Location/Address:** Sprecklesville, Wailuku  
   **Tax Map Key:** 3-8-2:102

#### PART I. WELL CONSTRUCTION REPORT

3. **Drilling Company:** Wailani Drilling Inc
4. **Name of driller who performed work:** Mike Robertson
5. **Type of rig/construction:** Air Rotary
6. **Date(s) Well Construction and pump tests (if any) completed:** 10/19/99
7. **GROUND ELEVATION (referenced to mean sea level, msl):** 25.6 ft.  
   **Well Bench Mark (description/location):** wellhead
   **Elevation (msl):** 26.0 ft.

8. **DRILLER'S LOG:** Please attach geologic log (if available or if required by permit)

<table>
<thead>
<tr>
<th>Depths (ft.)</th>
<th>Rock Description, Water Level, Dates, etc.</th>
<th>Depths (ft.)</th>
<th>Rock Description, Water Level, Dates, etc.</th>
</tr>
</thead>
<tbody>
<tr>
<td>0 to 20</td>
<td>Red Clay</td>
<td>38 to 42</td>
<td>Soft weathered Basalt</td>
</tr>
<tr>
<td>20 to 38</td>
<td>Dense Blue Rock</td>
<td>42 to 50</td>
<td>Cinder's water bearing</td>
</tr>
</tbody>
</table>

(If more space is needed, continue on back.)

9. **Total depth of well below ground:** 50 ft.
10. **Hole size:** 12.5 inch dia. from 0 ft. to 50 ft. below ground
    - 25 in. I.D. x 125 in. wall solid section to 30 ft. below ground
    - 14 in. I.D. x 125 in. wall perforated section to 50 ft. below ground

11. **Casing installed:**

<table>
<thead>
<tr>
<th>Casing Material/Slot Size:</th>
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<td>1.0. x 1.0. x 25 in. wall solid section to 30 ft. below ground</td>
</tr>
<tr>
<td>1.0. x 1.25 in. wall perforated section to 50 ft. below ground</td>
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<tr>
<td>1/4 in.</td>
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12. **Annulus:**

<table>
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<th>Grouted from</th>
<th>ft. below ground</th>
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<td>25 ft. below ground</td>
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<table>
<thead>
<tr>
<th>Gravel packed from</th>
<th>ft. below ground</th>
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</thead>
<tbody>
<tr>
<td>25 ft. below ground</td>
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</table>

13. **Initial water level:** 26.3 ft. below ground.  
   **Date and time of measurement:** 10/19/99 7:45 AM
14. **Initial chloride:** 400 ppm  
   **Date and time of sampling:** 10/19/99 7:45 AM
15. **Initial temperature:** 66°F  
   **Date and time of measurement:** 10/19/99

16. **PUMPING TESTS:**

   - **Reference Point (R.P.) used:** wellhead, which elevation is 26.0 ft.
   - **(1) Step-Drawdown Test Date**
   - **(2) Long-term Aquifer Test Date:** 10/19/99

17. **Pump Test Procedures data & graphs (12/17/97 SDPTD & CRPTD Forms) attached?** Yes
18. **As-built drawings attached?** Yes
19. **Other remarks/comments:** (On back of this form)

---

**Well Drilling Contractor (print):** Mike Robertson  
**C-57 Lic. No.:** 20115  
**Signature:** Mike Robertson  
**Date:** 10/30/99

**Surveyor (print):**  
**Lic. No.:**  
**Signature:**  
**Date:**

**Applicant (print):** Thomas D. Gerlach  
**Signature:** Thomas D. Gerlach  
**Date:** 4/23/99
PART II. (PERMANENT) PUMP INSTALLATION REPORT

20. Pump Installation Company: Wailani Drilling Inc
21. Name of person performing work: Mike Robertson
22. Date Pump Installation Completed: ____________
23. PUMP INSTALLATION:
   Pump Type, Make, Serial No.: __________________________
   Capacity: _______ gpm
   Motor type, H.P., Voltage, rpm:
   Depth of Pump Intake Setting ___________ ft. below __________, which elevation is __________ ft.
   Depth to bottom of airline ___________ ft. below __________, which elevation is __________ ft.
   Pumping Head is __________ ft. Type of flow meter: __________ which measures in _______

24. As-built drawings attached? _ Yes _ No
25. Other remarks/comments: (See below)

Pump Installation Contractor (print) __________________________ C-57 Lic. No. __________
Signature __________________________ Date __________________________

Applicant (print) __________________________
Signature __________________________ Date __________________________

8.(cont'd) DRILLER'S LOG (cont'd):
Depth (ft.) Rock Description, Remarks, Dates (ft.) Depth (ft.) Rock Description, Remarks, Dates (ft.)
________ to __________ __________ to __________
________ to __________ __________ to __________
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________ to __________ __________ to __________


9424-09 KEKLACH
FAX MEMO

For: Charlie Ice
From: Mike Robertson

Re: Un Surveyed Well Completion Reports.

This fax should contain WCA1 and Constant Rate Test for: Reali Johnson 5515-04
Maluhia Shower 5841-03
Heilo Ulin 5814-02
and Sprakelwell Capped 5424-09

As built well dogs and hard copies will follow this week in the mail. I also tomorrow will be faxing same for: Honey
Boehl
ONIEH
Moku lua Trust

Thank you: Mike Robertson

Mike Robertson

C.C.
PART I.

WELL CONSTRUCTION REPORT

4. Name of driller who performed work: Mike Robertson
5. Type of rig/construction: Air Rotary
6. Date(s) Well Construction and pump tests (if any) completed: 10/17/97
7. GROUND ELEVATION (referenced to mean sea level, msl): 65.6 ft. Relationship: "well head".
Elevation (msl): 26.6 ft.
8. DRILLER'S LOG: Please attach geologic log (if available or if required by permit)

Depths (ft.) Rock Description, Water Level, Dates, etc. Depths (ft.) Rock Description, Water Level, Dates, etc.

0 to 20 Red Clay 38 to 42 Soft weathered Basalt
20 to 38 Dense Blue Rock 42 to 50 Cinder, weathered Basalt

(If more space is needed, continue on back.)

9. Total depth of well below ground: 50 ft.
10. Hole size: 12.5 inch dia. from 0 ft. to 50 ft. below ground

11. Casing installed: 16 in. I.D. x 25 in. wall solid section to 30 ft. below ground
12. Annulus: Grouted from 0 ft. below ground to 25 ft. below ground

13. Initial water level: 26.3 ft. below ground. Date and time of measurement: 10/17/97 7:45 PM
14. Initial chloride: 400 ppm Date and time of sampling: 10/17/97 7:45 AM
15. Initial temperature: °F Date and time of measurement: 

16. PUMPING TESTS: Reference Point (R.P.) used: wellhead, which elevation is 26.6 ft.
   (1) Step-Drawdown Test Date
   Start water level __________ ft. below R.P.
   End water level __________ ft. below R.P.
   (2) Long-term Aquifer Test Date 10/17/97
   Start water level 26.3 ft. below R.P.
   End water level 26.3 ft. below R.P.

17. Pump Test Procedures data & graphs (1/2/97 SDPTD & CRPTD Forms) attached? Yes No
18. As-built drawings attached attached? Yes No

19. Other remarks/comments: (On back of this form)

Well Drilling Contractor (print) Mike Robertson C-57 Lic. No. 20115
Signature Mike Robertson Date 10/30/97
Surveyor (print) Lic. No.
Signature Date
Applicant (print) Thomas G. Gerlach
Signature Date 4/23/97
PART II.  (PERMANENT) PUMP INSTALLATION REPORT

20. Pump Installation Company: Wailani Drilling Inc
21. Name of person performing work: Mike Robertson
22. Date Pump Installation Completed:

23. PUMP INSTALLATION:
   Pump Type, Make, Serial No.: ____________________________
   Capacity: ________ gpm
   Motor type, H.P., Voltage, rpm: __________________________
   Depth of Pump Intake Setting ft. below ______ ft. below ______ ft.
   Depth to bottom of intake ft. below ______ ft., which elevation is ______ ft.
   Pumping Head is ______ ft. Type of flow meter: ______ which measures in ______.

24. As-built drawings attached attached? Yes No
25. Other remarks/comments: (See below)

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<thead>
<tr>
<th>Pump Installation Contractor (print)</th>
<th>C-57 Lic. No.</th>
</tr>
</thead>
<tbody>
<tr>
<td>Signature</td>
<td>Date</td>
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</table>

| Applicant (print) | |
| Signature         | Date |

8. (cont'd) DRILLER'S LOG (cont'd):

<table>
<thead>
<tr>
<th>Depth (ft.)</th>
<th>Rock Description, Remarks, Dates (ft.)</th>
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<th>Rock Description, Remarks, Dates (ft.)</th>
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</table>

19 & 25. Remarks: Custom unable to get surveyed elevation yet.

CONSTANT-RATE PUMP TEST DATA

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<th>Pumped Well No.</th>
<th>Observation well no.</th>
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<table>
<thead>
<tr>
<th>Pumped Well Name</th>
<th>Distance between Obs. &amp; Pumped Well ft.</th>
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<tbody>
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<td>Sprakle'sville</td>
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<td>Sanhed</td>
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<table>
<thead>
<tr>
<th>Target Q</th>
<th>gpm</th>
<th>Reference pt. for depth to water ft. msl</th>
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<tr>
<td></td>
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<td>Static Water Level @ start of test ______ ft. msl</td>
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<table>
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<th>Water level measurements by:</th>
<th>□ steel tape</th>
<th>□ pressure transducer</th>
<th>□ airline</th>
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START TEST Date: 10/19/99 Time of day: 7:45 Am

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<th>Flow Meter Reading Start: 500 gals</th>
<th>Suggested elapsed time (min)</th>
<th>Actual elapsed time (min)</th>
<th>Depth to water (nearest 8.1 ft)</th>
<th>Drawdown (unadjusted to nearest 8.1 ft)</th>
<th>Pumping rate (gpm)</th>
<th>EC (ppm)</th>
<th>Temp. °F</th>
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<th>Drawdown (unadjusted to nearest 0.1 ft)</th>
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<th>EC (µhos)</th>
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1 Chloride sampling required
2 Use same ending drawdown figure as start for recovery

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## Table 2 (CRPT Form 1217/97)

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<th>Suggested elapsed time</th>
<th>Actual elapsed time</th>
<th>Depth to water (nearest 0.1 ft)</th>
<th>Recovery Drawdown (unadjusted to nearest 0.1 ft)</th>
<th>Pumping rate Q (gpm)</th>
<th>EC (µhos)</th>
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</table>

Start recovery

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Data in this table is for:
- Pumped Well
- Observation Well

Remarks

Max possible duration, water level or quality did not stabilize for any 24 period

Begin recovery data
Flow meter reading at end of pumped period:

2495.2 gallons
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**END TEST** Date: 10/19/99  Time of day: 4:35 P.m.

**ADDITIONAL REMARKS:**

Person in charge of pump test (print): **Ann Robertson**

Signature: **Ann Robertson**

The signature above indicates that the data reported on this form is accurate and true to the best of the person's knowledge who operated this pump test.
Constant-Rate Pump Test
Sprecklesville-Gerlach Well
Constant Rate Pump Test - Well
Sprecklesville Gerlach Well  State Well- #5424-09  Elevation 26.60 ft. m.s.l. estimated

**3 hp. control box**

**2'x2' concrete slab**

- Red clay
- 1 in. PVC tube for monitor to 34 ft.

**Blue rock (basalt)**

- Static water level 26.3 ft.

**Weathered basalt**

- Cinders (red and black)

**2 in. flowmeter on 2 in. galv. column pipe**

- #12-3 pump cable

- 6 in. PVC louvered casing 30-50 ft.

- 3 hp 60 gpm @150 ft. Grundfos submersible. Intake at 34 ft.

- Chlorides 400 p.p.m.

- Hit water at 42 ft.

**Total Well Depth 50 ft.**

*Note: not drawn to scale*
**CONSTANT-RATE PUMP TEST DATA**

Table 2 (CRPTD Form 12/17/97)

Pumped Well No. **5424-09**

Pumped Well Name **Sprucesville-Gardock**

Distance between Obs. & Pumped Well __________ ft.

Target Q __________ gpm

Reference pt. for depth to water __________ ft. msl

Static Water Level @ start of test __________ ft. msl

Water level measurements by: 
[ ] steel tape  [ ] pressure transducer  [ ] airline

START TEST

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<th>Time of day: <em><strong>:</strong></em> Am</th>
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<th>Drawdown (unadjusted to nearest 0.1 ft)</th>
<th>Pumping rate Q (gpm)</th>
<th>EC (μmhos)</th>
<th>Cl⁻ (mg/l)</th>
<th>Temp. °F or °C</th>
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---|---|---|---|---|---|---|---|---|---|---|---
150 | 200 | 250 | 300 | 400 | 500 | 600 | 700 | 800 | 900 | 1000 | 1500 | 2000 | 2500 | 3000 | 4000 | 5000 | 6000 | 7000 | 8000 | 9000 | 10000 | 0 | 360° 75° Cl⁻ sample taken 

1 Chloride sampling required
2 Use same ending drawdown figure as start for recovery
<table>
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<th>Suggested elapsed time (min)</th>
<th>Actual elapsed time (min)</th>
<th>Depth to water (nearest 0.1 ft)</th>
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**END TEST**  Date: **10/19/99**  Time of day: **4:35 PM**

**ADDITIONAL REMARKS:**

Person in charge of pump test (print): **Ann Robertson**

Signature: **Ann Robertson**

The signature above indicates that the data reported on this form is accurate and true to the best of the person's knowledge who operated this pump test.
Constant - Rate Pump Test
Spreklesville - Gerlach Well
FAX MEMO

To: Charlie Ice  
For: Water Commission  
From: Mike Robertson  
Re: Start Work Notice  

Charlie:

As we discussed on the phone, I would like to start the following wells in the next 1 to 3 weeks respectively:

#1 Sprecklesville Gerlach Well
#2 Olowalu Martin Well
#3 Kaupo Williams Well

Thank you: Mike Robertson
Dear Mr. Gerlach:

Well Construction Permit
Sprecklesville-Gerlach Well (Well No. 5424-09)

Enclosed are two (2) copies of your approved Well Construction Permit for the captioned well(s) which authorizes well construction activities but excludes installation work for your permanent pump. As part of the Chairperson's approval, the following special conditions were added and are part of your permit under Permit Condition 12:

Special Conditions

1. Attached for your information is a copy of the Department of Health's (DOH) review comments. Please note DOH's requirements related to discharge of effluent from well drilling and testing activities.

2. The depth of the well must not exceed one-quarter the theoretical thickness of the aquifer.

This permit does not authorize work for your permanent pump installation. Approval and issuance of your pump installation permit is contingent upon information provided to and accepted by Commission staff as required in the Well Construction & Pump Installation Standards (1/23/97) and any special conditions performed under this permit. Please note that special conditions may simply highlight application deviations from the Standards. However, in accordance with the Commission's April 15, 1998 Declaratory Ruling No. DEC-ADM98-G5, which states:

"Permanent pump installation for capacities between 0-70 gpm and where the proposed use is for private individual needs in non-ground-water management areas may be allowed prior to the final pump installation permit issuance. When required as a condition of the well construction permit, subsequent pumping tests shall validate the acceptability of the permanent pump. The permanent pump installed prior to final pump installation permit issuance is subject to removal if the testing shows that a smaller pump is required to reduce the potential of affecting neighboring wells and localized upconing at the applicant's well."

a permanent pump may be installed prior to the permanent pump installation permit issuance. If you qualify and wish to take advantage of this ruling, please include a written request to install the permanent pump prior to final pump installation permit issuance when you return to us your validated well construction permit.
To validate your permit, please sign and have the contractor sign both permit originals and return one for our files. Also, copies of the aquifer pump test worksheet and the well completion report form are enclosed for your use. Please provide all the information in this packet to your well drilling contractor.

IMPORTANT - The permittee is responsible for all conditions of the permit. This includes ensuring that the well construction contractor, or other party who constructs the well(s), submits a completed Part I of the Well Completion Report form (enclosed) within sixty (60) days after the well construction work is completed. Be advised that you may be subject to fines of up to $1000 per day for any violations of your permit conditions.

If you have any questions, please call the Commission staff at 587-0251 or toll-free at 984-2400 (Maui), extension 70251.

Aloha,

MICHAEL D. WILSON
Chairperson

Enclosures
WELL CONSTRUCTION PERMIT

Sprecklesville-Gerlach Well, Well No. 5424-09

In accordance with Department of Land and Natural Resources, Commission on Water Resource Management’s Administrative Rules, Section 13-168, entitled "Water Use, Wells, and Stream Diversion Works", this document permits the construction and testing of Sprecklesville-Gerlach Well (Well No. 5424-09) at Sprecklesville, Wailuku, Maui, TMK 3-8-2:102, subject to the Hawaii Well Construction & Pump Installation Standards (1/23/97) which include but are not limited to the following conditions:

1. The Chairperson of the Commission on Water Resource Management (Commission), P.O. Box 621, Honolulu, HI 96809, shall be notified, in writing, at least two (2) weeks before any work authorized by this permit commences.

2. The well construction permit shall be for construction and testing of the well only. A minimum one-inch diameter monitor tube shall be permanently installed, in a manner acceptable to the Chairperson, to accurately record water levels. The permittee shall coordinate with the Chairperson and conduct a pumping test in accordance with the Standards (a pump testing worksheet is attached). The permittee shall submit to the Chairperson the test results as a basis for supporting an application to install a permanent pump and withdraw water for use. No permanent pump may be installed until a pump installation permit is approved and issued by the Chairperson.

3. In basal ground water, the depth of the well may not exceed one-fourth (1/4) of the theoretical thickness (41 times initial head) of the basal ground water unless otherwise authorized by the Chairperson.

4. The permittee shall incorporate mitigation measures to prevent construction debris from entering the aquatic environment, to schedule work to avoid periods of high rainfall, and to revegetate any cleared areas as soon as possible.

5. In the event that subsurface cultural remains such as artifacts, burials or concentrations of shells or charcoal are encountered during construction, the permittee shall stop work and contact the Department’s Historic Preservation Division (587-0045) immediately.

6. The proposed well construction shall not adversely affect existing or future legal uses of water in the area, including any surface water or established instream flow standards. This permit or the authorization to construct the well shall not constitute a determination of correlative water rights.

7. The following shall be submitted to the Chairperson within sixty (60) days after completion of work:
   b. Elevation (referenced to mean sea level, msl) survey by a Hawaii-licensed surveyor.
   c. As-built sectional drawing of the well.
   d. Plot plan and map showing the exact location of the well.
   e. Complete pumping test records, including time, pumping rate, drawdown, chloride content, and other data.

8. Non-compliance with any applicable laws, rules, and ordinances may be grounds for revocation of this permit.

9. The well construction permit application is incorporated into this permit by reference and is subject to the Hawaii Well Construction & Pump Installation Standards (HWCPIS, 1/23/97). If the HWCPIS are not followed and as a consequence water is wasted or contaminated, a lien on the property may result.

10. The permit may be revoked if work is not started within six (6) months after the date of approval or if work is suspended or abandoned for six (6) months, unless otherwise specified. The work proposed in the well construction permit application shall be completed within two (2) years from the date of permit approval, unless otherwise specified. The permit may be extended by the Chairperson upon a showing of good cause and good-faith performance. A request to extend the permit shall be submitted to the Chairperson no later than three (3) months prior to the date the permit expires. If the commencement date is not met, the Commission may revoke the permit after giving the permittee notice and an opportunity to be heard.

11. If the well is not to be used it must be properly capped. If the well is to be abandoned then the permittee must apply for a well abandonment permit in accordance with §13-168-12(f) prior to any well sealing or plugging work.

12. Special conditions in the attached cover transmittal letter are incorporated herein by reference.

Date of Approval: October 21, 1998
Expiration Date: October 21, 2000

I have read the conditions and terms of this permit and understand them. I accept and agree to meet these conditions as a prerequisite and underlying condition of my ability to proceed and understand that I do not hold a valid permit until I and the driller have signed, dated, and returned the permit to the Commission. I also understand that non-compliance with any permit condition may be grounds for revocation and fines of up to $1000 per day.

Permittee’s Signature: ___________________________ Date: ___________
Printed Name: ___________________________ Firm or Title: ___________________________

Driller’s Signature: ___________________________ License #: ___________________________ Date: ___________
Printed Name: ___________________________ Firm or Title: ___________________________

Please sign both copies of this permit, return one to the Chairperson, and retain the other for your records.

Attachment
   USGS
   Department of Health/ Safe Drinking Water, Wastewater, and Clean Water Branches
   Maui Department of Water Supply
In accordance with Department of Land and Natural Resources, Commission on Water Resource Management’s Administrative Rules, Section 13-168, entitled “Water Use, Wells, and Stream Diversion Works”, this document permits the construction and testing of Sprecklesville-Gerlach Well (Well No. 5424-09) at Sprecklesville, Wailuku, Maui, TMK 3-8-2:102, subject to the Hawaii Well Construction & Pump Installation Standards (1/23/97) which include but are not limited to the following conditions:

1. The Chairperson of the Commission on Water Resource Management (Commission), P.O. Box 621, Honolulu, HI 96809, shall be notified, in writing, at least two (2) weeks before any work authorized by this permit commences.

2. The well construction permit shall be for construction and testing of the well only. A minimum one-inch diameter monitor tube shall be permanently installed, in a manner acceptable to the Chairperson, to accurately record water levels. The permittee shall coordinate with the Chairperson and conduct a pumping test in accordance with the Standards (a pump testing worksheet is attached). The permittee shall submit to the Chairperson the test results as a basis for supporting an application to install a permanent pump and withdraw water for use. No permanent pump may be installed until a pump installation permit is approved and issued by the Chairperson.

3. In basal ground water, the depth of the well may not exceed one-fourth (1/4) of the theoretical thickness (41 times initial head) of the basal ground water unless otherwise authorized by the Chairperson.

4. The permittee shall incorporate mitigation measures to prevent construction debris from entering the aquatic environment, to schedule work to avoid periods of high rainfall, and to revegetate any cleared areas as soon as possible.

5. In the event that subsurface cultural remains such as artifacts, burials or concentrations of shells or charcoal are encountered during construction, the permittee shall stop work and contact the Department’s Historic Preservation Division (587-0045) immediately.

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Permittee’s Signature: __________________________ Date: 4/23/99
Printed Name: ___________________________ Firm or Title: owner

Driller’s Signature: ___________________________ License #: 20115 Date: 4/23/99
Printed Name: ___________________________ Firm or Title: Water Drilling

Please sign both copies of this permit, return one to the Chairperson, and retain the other for your records.

Attachment

C:
USGS
Department of Health/ Safe Drinking Water, Wastewater, and Clean Water Branches
Maui Department of Water Supply
TO: Honorable Lawrence Miike, Director
Department of Health
Attention: Dennis Tulang, Wastewater Branch
William Wong, Safe Drinking Water Branch

FROM: Michael D. Wilson, Chairperson
Commission on Water Resource Management

SUBJECT: Well Construction Permit Application
Sprecklesville-Gerlach Well (Well No. 5424-09)

Transmitted for your review and comment is a copy of the captioned well application.

We would appreciate your comments on the captioned application for any conflicts or inconsistencies with the programs, plans, and objectives specific to your department. Please respond by returning this cover memo form by October 16, 1998.

Please find a map, attached, to locate the proposed well. If you have any questions about this permit application, request additional information, or request additional review time, please contact Charley Ice of the Commission staff at 587-0251.

RESPONSE:

[ ] This well qualifies as a source which will serve as a source of potable water to a public water system (serving 25 or more people at least 60 days per year or has 15 or more service connections) and must receive Director of Health approval prior to its use to comply with Hawaii Administrative Rules (HAR), Title 11, Chapter 20, Rules Relating to Potable Water Systems, §11-20-29.

[ ] This well does not qualify as a source serving a public water system (serves less than 25 people or more people at least 60 days per year or 15 service connections) and if the well water is used for drinking, the private owner should test for bacteriological and chemical presence before initiating such use and routinely monitor the water quality thereafter. However, if future planned use from this source increases to meet the public water system definition then Director of Health approval is required prior to implementation.

[ ] If the well is used to supply both potable and non-potable purposes in a single system, the user shall eliminate cross-connections and backflow connections by physically separating potable and non-potable systems by an air gap or an approved backflow preventer, and by clearly labeling all non-potable spigots with warning signs to prevent inadvertent consumption of non-potable water. Backflow prevention devices should be routinely inspected and tested.

[ ] It does not appear that this well will be used for consumptive purposes and is not subject to Safe Drinking Water Regulations.

[ ] For the applicant's information, a source of possible wastewater contamination [ ] is [ ] not located near the proposed well site (information attached).

[ ] Other relevant DOH rules/regulations, information, or recommendations are attached.

[ ] No comments/objections

Contact Person: Lori N. Kajiwara
Phone: 586-4294
Date: 10-13-98
TO: Honorable Lawrence Miike, Director
   Department of Health
   Attention: Dennis Tulang, Wastewater Branch
   William Wong, Safe Drinking Water Branch

FROM: Michael D. Wilson, Chairperson
   Commission on Water Resource Management

SUBJECT: Well Construction Permit Application
   Spreckelsville-Gerlach Well (Well No. 5424-09)

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[ ] Other relevant DOH rules/regulations, information, or recommendations are attached.

[ ] No comments/objections

Contact Person: William Wong
Phone: 586-4258
Date: 10/12/98
**Well No.** 5424-09  
**Well Name** Spreckelsville-Gerlach  
**Applicant** Tom Gerlach  
**Date of Review** 10/7/98  
**Reviewer** RRI

### SECTION 1: WELL LOCATION INFORMATION

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<thead>
<tr>
<th>Island</th>
<th>MAUI</th>
<th>Proposed Use</th>
<th>Domestic</th>
</tr>
</thead>
<tbody>
<tr>
<td>Aquifer System</td>
<td>CENTRAL</td>
<td>Proposed Withdrawal</td>
<td>9000</td>
</tr>
<tr>
<td>Aquifer Sector</td>
<td>######</td>
<td>System Sustainable Yield</td>
<td>3</td>
</tr>
</tbody>
</table>

### SECTION 2: WELL SECTION DATA  (enter data in grey cells only)

| Elevation at top of casing | 41 ft., m.s.l. | Solid Casing Material |  
| Ground Elevation | 40 ft., m.s.l. | Designation |  
| Cement Grout | 20 ft. | Length |  
| Rock Packing | 6 ft. | Diameter |  
| Hole Diameter | 10 in. | Wall Thickness | 0.25 in. |

| Total Depth | 70 ft. |

| Estimated Head | 3 ft., m.s.l. |
| Calculated Aquifer Thickness | 41 ft. |

| County Water Supply (Y/N ?) | N  |

### SECTION 3: CHECKLIST  (values to check are shaded)

**Well Depth**

- Theoretical Thickness of Aquifer | 41 ft. |
- 1/4 Aquifer Thickness | 10.25 ft. |
- Depth of Well below Sea Level | 30 ft. too deep (refer to HWCPIS Section 2.2) |

**Well Casing**

- Minimum Wall Thickness
  - Material County or Non-County | non-county |
  - Minimum Thickness per standards | ###### in. |
  - Wall Thickness Provided | 0.250 in. ###### (refer to HWCPIS Section 2.4 c) |
- Minimum Length of Solid Casing
  - 90% of ground to top of aquifer | 35.1 ft. |
  - Length of solid casing Provided | 60 ft. okay (refer to HWCPIS Section 2.4 d) |
- Casing Material | ###### ###### (refer to HWCPIS Section 2.4 e) |

**Annular Space**

- If the cell above reads #N/A, reference HWCPIS)
- Depth of Grouting
  - Calculated Depth of Grouting | 27.3 ft. |
  - Depth of Grouting provided | 20 ft. not enough (refer to HWCPIS Section 2.6 c) |
  - Thickness of Annular Space | 3 in. okay (refer to HWCPIS Section 2.6 d) |
The Department of Health, Clean Water Branch has the following comments:

1. For Well-Drilling Activities

Any discharge to State waters of treated process wastewater effluent associated with well drilling activities is regulated by Hawaii Administrative Rules, Chapter 11-55, Appendix I, effective September 22, 1997. Treated process wastewater effluent covered by this general permit includes well drilling slurries, lubricating fluids wastewaters, and well purge wastewaters. This general permit does not cover well pump testing. The applicable Notice of Intent Forms and filing fee shall be submitted at least thirty (30) days before the start of discharge to the Department of Health, Clean Water Branch at 919 Ala Moana Boulevard, Room 301, Honolulu, Hawaii 96814-4920 or P.O. Box 3378, Honolulu, Hawaii 96801-3378. Inquiries may be directed to the Clean Water Branch at (808) 586-4309 or by fax at (808) 586-4352.

2. For Well Pump Testing

The discharger shall take all measures necessary to prevent the discharge of pollutants from entering state waters. Such measures shall include, if necessary, containment of the initial discharge until the discharge is essentially free of pollutants. If the discharge is entering a stream or river bed, best management practices shall be implemented to prevent the discharge from disturbing the clarity of the receiving water. If the discharge is entering a storm drain, the discharger must obtain written permission from the owner of that storm drain prior to discharge. Furthermore, best management practices shall be implemented to prevent the discharge from collecting sediments and other pollutants prior to entering the storm drain.

JS/cr
Mr. Tom Gerlach  
P.O. Box 1111  
Haiku, HI 96708

Dear Mr. Gerlach:

Well Construction / Pump Installation Permit Application for Well No. 5424-09

We acknowledge receipt, on September 29, 1998, of the tax map plat from the Department of Finance Real Property Assessment Division showing your parcel, and accept your well construction / pump installation permit application for the Spreckelsville-Gerlach Well (Well No. 5424-09) as complete. You can expect your application to be processed within ninety (90) days from this date.

For your information, the process of constructing a well is normally regulated and permitted in two (2) steps. First, a well construction permit is issued for drilling and testing purposes only. Based upon information provided by you through a Well Completion Report Part 1 (Well Construction), a pump installation permit may then be issued to authorize pump work. If a pump is installed then a Well Completion Report Part 2 (Pump Installation) is required.

If you have any questions about your permit application, please contact Charley Ice of the Commission staff at 587-0251 or toll free at 984-2400, extension 70251.

Sincerely,

TIMOTHY E. JOHNS  
Deputy Director

CI: ss

c: Mike Robertson, Wailani Drilling Co.
Mr. Mike Robertson  
Wailani Drilling Co.  
655 Kūlike Road  
Haiku, Hawaii 96708

Dear Mr. Robertson:

Well Construction Permit  
Spreckelsville-Gerlach Well (Well No. 5424-09)

We have accepted the application for the captioned well as complete and will be processing it normally. Please note that a tax map was not included, and the tax map parcel number indicated on the application does not appear on our perhaps outdated copy. The applicant arranged for the Department of Finance Real Property Assessment Division to send us an updated copy of the appropriate plat map, showing the parcel in question, which has resolved this issue.

Also, the proposed well section indicates a 70-foot depth for a well at a ground elevation of 40 feet, which seems too deep. It must not be more than one-fourth the theoretical thickness of the aquifer. At this location, we suspect that water levels are not likely to be more than about one foot, suggesting an aquifer thickness of no more than 41 feet. Please review the proposal and clarify this point.

If you have any questions, please call Charley Ice at 587-0251 or toll-free at 984-2400, extension 70251.

Sincerely,

TIMOTHY E. JOHNS  
Deputy Director

Ci:ss

c: Tom Gerlach
TO:       Honorable Lawrence Miike, Director
          Department of Health
          Attention: Dennis Tulang, Wastewater Branch
          William Wong, Safe Drinking Water Branch

FROM:    Michael D. Wilson, Chairperson
          Commission on Water Resource Management

SUBJECT: Well Construction Permit Application
          Spreckelsville-Gerlach Well (Well No. 5424-09)

Transmitted for your review and comment is a copy of the captioned well application.

We would appreciate your comments on the captioned application for any conflicts or inconsistences with the programs, plans, and objectives specific to your department. Please respond by returning this cover memo form by October 16, 1998.

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RESPONSE:

[ ] This well qualifies as a source which will serve as a source of potable water to a public water system (serving 25 or more people at least 60 days per year or has 15 or more service connections) and must receive Director of Health approval prior to its use to comply with Hawaii Administrative Rules (HAR), Title 11, Chapter 20, Rules Relating to Potable Water Systems, §11-20-20.

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[ ] Other relevant DOH rules/regulations, information, or recommendations are attached.

[ ] No comments/objections

Contact Person: ____________________________ Phone: ____________________________

Signed: ____________________________ Date: ____________________________
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<td>TOTAL</td>
<td>25.00</td>
</tr>
</tbody>
</table>

REMARKS: LINE (1) Well No. 5424-09 (WCPA/PIPA)
LINE (2)
LINE (3)
LINE (4)

THOMAS D. GERLACH
DBA GERLACH LANDSCAPE AND
LAWN SERVICES
GENERAL DELIVERY 280-2959
HAUKU, MAUI, HI 96708

PAY TO THE ORDER OF  Water Resource Commission  $25.00

First Hawaiian Bank
Pukalani Branch
P.O. BOX 120
Pukalani, Maui, Hawaii 96762

MEMO: Well permit fee

DATE: 10/7/98

THOMAS D. GERLACH

Dollars 25.00
State of Hawaii
COMMISSION ON WATER RESOURCE MANAGEMENT
Department of Land and Natural Resources

APPLICATION FOR PERMIT
X Well Construction  X Pump Installation

Instructions: Please print in ink or type and send completed application with attachments to the Commission on Water Resource Management, P.O. Box 621, Honolulu, Hawaii 96813. Application must be accompanied by a non-refundable filing fee of $25.00 payable to the Dept. of Land and Natural Resources. The Commission may not accept incomplete applications. For assistance, call the Regulation Branch at 587-0225.

1. APPLICANT: (circle primary c
(a) WELL OWNER
Firm/Name Tom Gerlach
Contact Person Same
Address P. O. 1111 Haleak, HI 96708
(b) LANDOWNER
Firm/Name Same
Contact Person Ph:
Address
(c) CONTRACTOR
Firm/Name Wailani Drilling Company Ph:572-2673
Contractor’s C-57 License No. C-20115
Contact Person Mike Robertson
Address 565 Kulike Rd. Haiku, Maui, Hawaii, 96708

2. WELL LOCATION/NAME: Sprekiesville-Gerlach Well Island Maui
Address 55 Aeleki Place Paia, HI 96761 Tax Map Key 3-8-2-102
Attach a USGS map, scale 1"=2000', and a property tax map showing well location referenced to established property boundaries.

3. (a) PROPOSED WORK
Deepen X Install New Pump
Modify Existing Well Redrill Modify Pump
Abandon/Seal * Replace Pump
* Be sure to complete and submit well abandonment report upon completion of work.
(b) WELL TYPE:
Dug Bored Driven X Drilled Radial
Is this well a part of a battery of wells? Yes X No
(Briefly describe and fill in the diagram on the back of this form.)

4. PROPOSED PUMP INFORMATION: Rated Pump Capacity: 60 gallons per minute
Pump Type: Motor:
Deep Well Turbine Rotary Propeller Diesel
X Submersible Rotary-Displacement Reciprocating Gas
Centrifugal Rotary-Gear Impulse X Electric, rated horsepower: 3
If Pump Replacement, Existing Pump Capacity: N. A. gallons per minute

5. PROPOSED USE:
Municipal (including hotels, stores, etc.) Military
X Domestic (individual, noncommercial water sys.) Industrial
X Irrigation (crop) Landscape Other (explain)

6. (a) PROPOSED AMOUNT OF WITHDRAWAL: 9000 gallons per day
(b) METHOD OF FLOW MEASUREMENT: X Flow-meter Open-pipe Orifice Plate Weir

7. PENDING ACTIONS: CDUA SMA EIS EA X NONE Other (explain)
Completion Date N.A.

REMARKS,EXPLANATIONS:

(If more space is needed, continue on back)

I understand that approval of this application attaches the following standard conditions: 1) the proposed work is to be completed within two (2) years of the approval date; 2) the contractor shall submit to the Commission a well completion/abandonment report within 30 days after the completion date of the permitted work; 3) monthly water use data shall be submitted to the Commission; 4) such approval shall not constitute a determination of correlative water rights and shall not guarantee the pump capacity or future use to the permitted pump capacity.

Tom Gerlach Well Owner
Signature __________________________
Date __________

Tom Gerlach Landowner
Signature __________________________
Date __________

Mike Robertson Contractor
Signature __________________________
Date __________

For Official Use Only:
Date Received ____________________________
Date Accepted ____________________________
Field Checked By ____________________________
Date ____________________________

Longitude __________ Latitude __________
Aquifer System Name 5424-07
State Well No. __________

11GWR WTR Form
### 9. PROPOSED WELL SECTION

<table>
<thead>
<tr>
<th>Component</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>Elevation</td>
<td>Ground elevation: 40 ft., msl*</td>
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<tr>
<td>Top of casing</td>
<td>41 ft., msl.</td>
</tr>
<tr>
<td>Cement Grout</td>
<td>20 ft.</td>
</tr>
<tr>
<td>Rock Packing</td>
<td>0 ft.</td>
</tr>
<tr>
<td>Hole Diameter</td>
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<tr>
<td>Total Depth</td>
<td>70 ft.</td>
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<td>Solid Casing</td>
<td>Material: P.V.C. Schedule 40</td>
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<td>Length: 4 in.</td>
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<tr>
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<td>Diameter: 4 in.</td>
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<tr>
<td></td>
<td>Wall thickness: 0.25 in.</td>
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<tr>
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<tr>
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<td>Diameter: 4 in.</td>
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<td>Wall thickness: 0.25 in.</td>
</tr>
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<td>Open Hole:</td>
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<tr>
<td></td>
<td>Diameter: N.A. in.</td>
</tr>
</tbody>
</table>

*Approximate elevation at time of filing application. Ground elevation above mean sea level (msl) by a surveyor licensed by the State must be submitted at start of construction. Final elevations of well components shall be submitted in the well completion/well abandonment reports.*