

ZARDOZ FLUORO+
TESTING REPORT ZR100c
Initial - March 25, 2007,
Revisions -11/12/2007, 3/30/2008

Gran Tech Labs

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Background Research:

Patents:

Testing of multiple wax types and CA contact angle

<http://www.patentstorm.us/patents/6465398-fulltext.html>

Surface lubricant for objects contacting forms of water and method of preparation

<http://www.patentstorm.us/patents/5409622-fulltext.html>

Ceramic reinforced fluoropolymers:

<http://www.patentstorm.us/patents/5783308-fulltext.html>

http://www.cerflon.com/docs/Cerflon_patent.pdf

<http://www.cerflon.com/>

Papers:

Leonid Kuzmins, Investigation of the most essential factors influencing ski glide

<http://epubl.ltu.se/1402-1757/2006/03/LTU-LIC-0603-SE.pdf>

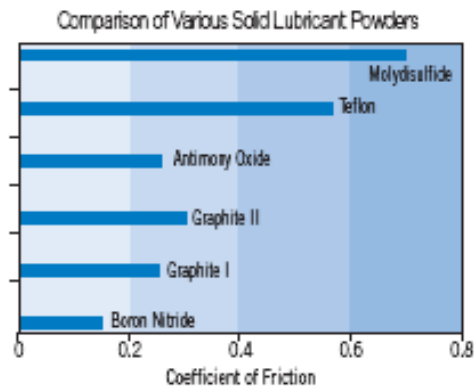
S.E.Jordan, C.A.Brown, "Comparing Texture Characterization Parameters on Their Ability to Differentiate Ground Polyethylene Ski Bases"

<http://cstools.asme.org/csconnect/pdf/CommitteeFiles/20108.pdf>

PETER ANDREAS FEDEROLF,

FINITE ELEMENT SIMULATION OF A CARVING SNOW SKI

<http://e-collection.ethbib.ethz.ch/ecol-pool/diss/fulltext/eth16065.pdf>



GE, Momentive

Testing Methodology:

Phase I. March 2007

Dates tested:

Location:

March 17, 2007	Ski Roundtop, Lewisberry, Pa
March 18, 2007	Ski Liberty, Fairfield, Pa
March 20, 2007	Ski Liberty, Fairfield, Pa
March 25, 2007	Ski Roundtop, Lewisberry, Pa
March 17..25, 2007	Owings Mills, Maryland USA

Lab Testing:

Used Sessile drop method, CA contact angle observations.
Application of various waxes both rub on and hot iron applications.

Rub On application

Wax applied in the field and in lab. The paste wax was rubbed on and let dry 3 minutes, then buffed with a cork. The hard wax was rubbed aggressively, and then corked. Notwax does not need corking.

Hot Iron application

Skis were cleaned 4 times with ZARDOZ Super Z base cleaner. The skis were wiped with water and dried with a paper towel. Waxes were ironed onto the ski base at #2 setting on iron. Wax was allowed to cool 30 minutes before scrapping.

On-Snow Performance:

Skis were tested on snow over four days at two resorts. One day was used to do a limited test of rub on application of ZARDOZ FLUORO+. This day was used to test ZARDOZ FLUORO+ under race conditions and continue to free ski afterwards. The second through the fourth day was devoted to iron on application and the durability and longevity of ZARDOZ FLUORO+. Full details are provided on weather such as temperature, humidity, dewpoint, snow type and if it was sunny or cloudy.

Durability:

Hot iron application,
Record hours on snow
Record feet/miles traveled

Lab Tests Phase I:

Sample Size: 1 OZ. Used 1/3 OZ for rub on application and hotwax.
3 pair skis or 3 snowboards per OZ.

Water Droplet test:

Zardoz Fluoro+ Compared to:	10
Toko Yellow	2
NOBI Red	5
NOBI Blue	5
NOBI Black	5
Hertle Super Hot Sauce	5
Felix Process NOBI Red/NOTWAX	7
ZARDOZ FLUORO+ Rub On	10
NOTWAX	8
Swix FX4 Rub	7
Himankol P3 Paste	5
Bath Soap	0
Beeswax	4

Outcome – **Zardoz Fluoro+** outperformed all waxes. Angle of water bead was higher.

Static Contact Angle Measurements (US Patent **6,465,398**)

These measurements were conducted using a Rame-Hart Manual Contact Angle Goniometer. Samples were prepared in the same way as with the Dynamic Contact Angle Measurements.

Data generated from the static CA measurements:

Test Material ("wax")	CA Contact angle	Surface
P5 (swix CH8+50% Dupont Teflon.RTM.PFA9724)	105	39.8
Swix CH8 (hydrocarbon wax)	112	21.6
Swix CH10 (hydrocarbon wax)	116	25.3
Y5 (swix CH10+50% Dupont Teflon.RTM.PFA9724)	107	21.6
Swix HF6 (highly fluorinated wax)	112	19.6
Himankol Snow Champ SF 0/2 (fluorinated wax)	118	24.4
Himankol Fluor GW25 (fluorinated wax)	112	18.1
Zardoz Speedy Blue (wax + <20% Krytox)	118	22.8

Other reference:

Leonid Kuzmins, Investigation of the most essential factors influencing ski glide

Regular Paraffin	108
Silicon	112
PTFE	120



Photo- droplets of distilled water. The droplet broke up upon impact, producing globules. This shows very low surface tension.

Performance Tests:

RUB ON:

Due to time constraints, I was unable to test the RUB ON application from a clean ski base. I was however able to test the RUB ON application under the following conditions.

Ski base was prepped with ZARDOZ Notwax, then a layer of NOBI RED Warm RACE wax (hotwax), then a brass brush, and top off with ZARDOZ NOTWAX.

Tested under RACE CONDITIONS:

Starting with the Ski prepped as described above, for 2 race runs ZARDOZ Notwax was applied for each run. The third run, white fluoro powder was applied and corked in.

The fourth run, ZARDOZ FLUORO+ was Hand Rubbed and then corked. The fifth run. Nothing added.

Hence the race times are listed, and note the last two runs were the fastest. Please note all racers times were faster for the last two runs. I have concluded from this test that ZARDOZ FLUORO+ performed as well as NOTWAX/Nobi wax, or fluoro Powder. Unlike NOTWAX, ZARDOZ FLUORO+ appeared to hold up exceptionally well on a High Speed Race course, and did not require more application of product

Notwax was rated a bit higher than ZARDOZ FLUORO+ only due to Notwax being so easy to apply,



Photo- Roundtop Race Saturday 3/17/2007

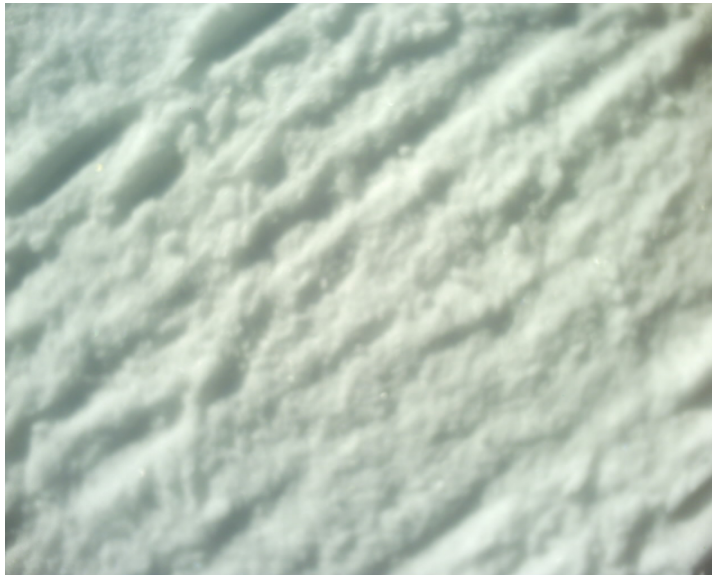
MELT ON:

Ski base was cleaned with ZARDOZ Super Z Cleaner.
ONLY ZARDOZ FLUORO+ was melted onto the base. No Smoke was observed during application. Application was smooth, almost silky.
Good penetration of wax into the base was observed. After 30 minutes the ski base was scraped to remove excess. A brass brush was used to expose ski base structure.

The structure was as follows.

Under the binding on the base; 30 degree cross hatch and coarse.
Then tip to tail coarse linear structure. This will create a diamond pattern under the binding, seems to work better in the warm spring conditions. The structure is pressed into base. It was still present after 3 days of skiing.

Each day for 2 days and one night, I ran this ski performing High Speed race turns for four hours straight. I also did some mogul runs, and a bit of flat runs. ZARDOZ FLUORO+ performed better than other waxes I have tested, even better than NOTWAX itself. From the time I started skiing till the time I ended, the ZARDOZ FLUORO+ wax had the same feel underneath with no degradation.



Day 1 , Liberty. Close up of snow surface



Water droplet, after 4 hrs, 12 miles. Day 1



Day 3 Roundtop, Shows crystal size



Base after 12 hours 48 miles

CONCLUSION PHASE I:

Most waxes use paraflint, a wax additive to increase wear and durability. If there is too much paraflint in the formula, it will make scraping the base extremely difficult. Paraflint does not add to the lubricity of the formula. Ceramic fortified Fluro in ZARDOZ FLUORO+, adds the following properties: Durability, second to diamond in hardness; Lubricity, similar to graphite; Thermal protection; Dielectric, removes static, and corrosion resistance for the metal edges. The Notwax added to the mix will assure dirt repellency. Dirt can be a drag as pointed out by Leonid Kuzmins, Investigation of the most essential factors influencing ski glide

I was very impressed with ease of application, durability, lubricity, which resulted in fast speeds, and low coefficient of friction. During the durability test I never observed base burn especially near the edges. From the time I hit the slopes to when I quit, ZARDOZ FLUORO+ out performed all others.

Temp Range	28 to 55	degrees F
Humidity Range	22 to 60	Percent
Dewpoint Range	9 to 36	degrees F
Sunny/ Cloudy	Both	
Day / Night	Both	
Snow Types	New , Man made, old, Spring, Frozen granular, Loose granular, ice, dirty (dirt, pollen)	

Recommended Usage:

Durability:

Rub On – Cork:	1 to 2 days
Iron In – Cork:	3 to 5 days

Application:

3 pair of skis/3 snowboards per OZ hot wax application.
5 pair of skis/5 snowboards per OZ rub on application

PHASE II - ON SNOW TESTS – Participants over a full season

Methodology:

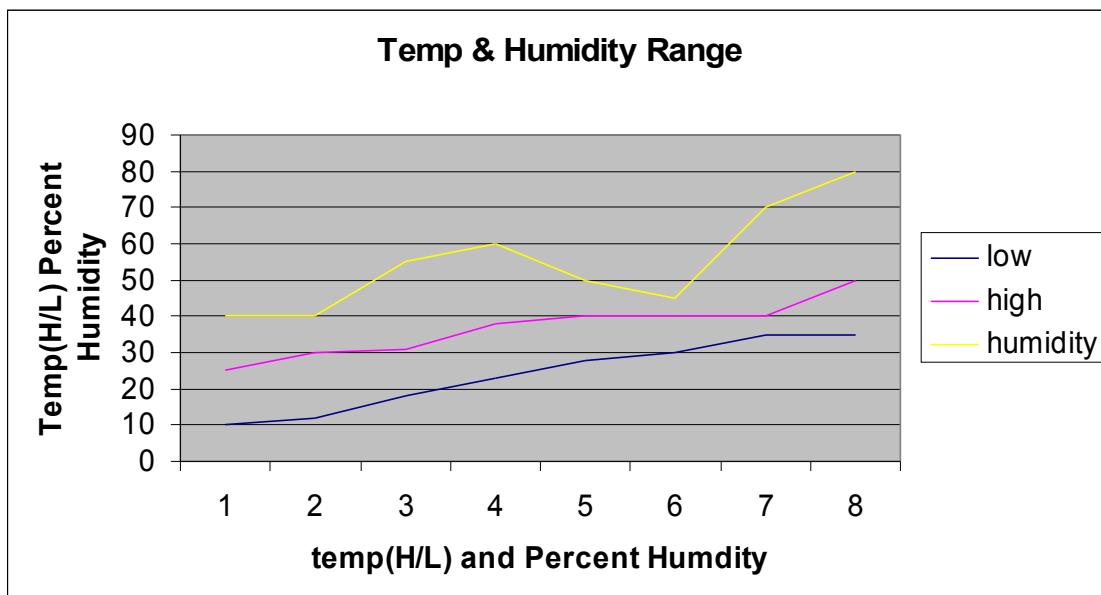
Assign five participants who:

1. Already race
2. Willing to fill out report
3. Know how to hot wax
4. Familiar with many name brand waxes

The participants were asked to perform over multiple days, under race and free time skiing. A Sample of the form is provided in the appendix:

This seasons weather, Temperature and humidity:

Temps		
low	High	humidity
10	25	40
12	30	40
18	31	55
23	38	60
28	40	50
30	40	45
35	40	70
35	50	80



Summary of the participants' results:

Rating scale. 1 worst 10 best, compared to your usual wax.
Usual wax = 5

Category

	User1	User2	User3	User4	User5	results Avg
HOT WAX APP:						
Ease of application	7.5	9	9	9	10	8.9
Smoke Y/N	n	n	n	n	n	n
Scrape off	8	8	8	9	10	8.6
Overall rating	8	8	8	9	10	8.6
RUB ON APP:						
Ease of application						
Ease of buff						
Overall rating						

ON SNOW PERFORMANCE:

Category

Glide Static / from stop	8	9	10	9	10	9.2
Glide Dynamic / while moving	8	9	10	9	10	9.2
Sticky	n	n	n	n	N	N
Overall Glide	8	9	10	9	10	9.2
Longevity How many days	2	1	1	1	2	1.4
Did you apply Liq Notwax	n	n	n	y	Y	40% Yes

RACE PERFORMANCE:

Category

Rating scale. 1 worst 10 best,
compared to your usual wax. Usual
wax = 5

Glide Static / from stop	8	9	10	9	10	9.2
Glide Dynamic / while moving	8	9	10	9	10	9.2
Sticky	n	n	n	n	N	N
Overall Glide	8	9	10	9	10	9.2
Longevity During Race	2	1	1	1	2	1.4
Did you apply Liq Notwax	n	y	y	y	Y	80% yes

Full participants' data has been scanned and is included in the appendix.
Many used the product all winter long. A new application was performed for each race weekend.

FINAL CONCLUSION:

Forget the chemicals,

Forget the hype, what does an average skier or boarder, desire in a wax?

- Does it work in a broad range of conditions, yet compare to waxes with a narrow temperature and humidity range?
- Easy to apply
- Economical
- Superior Glide

Everyone has experienced a bad wax day but;
If everyone had ZARDOZ Fluoro +, their troubles will be over.

For the last few years, '8 years', the testers had to use other competitors hard melt wax along with Zardoz Notwax using the felix process. ZARDOZ Fluoro + enhances the Zardoz effect.

The testing was done with the main goal to prove if the ZARDOZ Fluoro + formula had the following properties:

- 1- Easy to apply
 - a. Rated 30% better then test participants normal wax used
 - b. No Smoke
 - c. Can be rubbed and buffed with out hot melt
 - d. Every tester raved about the ease of application
- 2- Easy to scrape off
 - a. Rated 30 % better then their normal wax used
 - b. Passed the Draper test
- 3- Performs in a broad temperature and humidity range
 - a. Proven performer from a low of 10 degrees f to a high of 60 degrees f
 - b. Humidity from 20% to 100% in the rain.
- 4- Performs in a broad range of snow quality types
 - a. Man made, natural, old snow, dirt, frozen granular, ice.
- 5- Dirt, gunk repellent
 - a. During the thin and brown conditions early and late season, product does not allow for dirt build up. This dirt could be pollen, waxes, earth, oils from equipment, cosmic dust, etc
- 6- Enhanced glide
 - a. Glide rated 40 % better then their normal wax used.
- 7- Economical
 - a. An average of 10 to 12 wax applications per product.

Zardoz Fluoro + is a winner based on two years of real world testing for the average skier or boarder.

“A synergistic combination, for a perfect glide no matter where, or what the conditions”

Tested and approved by ZARDOZ RENEGADES Race Team.

Appendix:

Initial Data from phase I - 2007

ZARDOZ FLURO+ TEST

William Ed Fowler March 17,18 2007

Updated 11/12/2007

COMPARED TO:

ZARDOZ NOTWAX FELIX w/NOBI RED WARM
RACE

ZARDOZ NOTWAX

Hertle Super Hot sauce

SWIX FX4 Rub on

Himenkol P3 paste

NOBI RED warm race

NOBI BLUE cold race

NOBI Black Graphite all temp

Flouro Powder

	Comment	Rating Scale 1- 10Best 5 is baseline
LAB TEST		
Water Droplet test	High Angle droplet, Roll test the best	10
APPLICATION TEST		
Apply With IRON		
SMOKE TEST	No Smoke Iron on 2	10
Ease of use	Easy to apply, Silky, good penetration into base, easy to scrape	10
APPLY Rub ON		
Ease of use	Same as compared to any hard wax rub on/ cork	5
wear resistance	Exceptional, Better than Fluro powder and Notwax by itself or felix using Nobi Red	10
Overall Comment	Exceptional Durability, FAST Used on 3/17/2007	10

DURABILITY TESTING		WEATHER					Dewpoint	Snow type
		Temp	Humidity	SUN/Y N				
wear resistance/ durability DAY1 at Ski Liberty PA	4 hours non stop , Hi Speed race turns, Black diamond, double black, and Blue runs. Same glide at end of four hours was the same as the first .	10	28 -> 35	53 ->41	SUNNY Y	9-> 10	powder / packed Powder, New snow mix with old manmade	
wear resistance/ durability DAY2 at Ski Liberty PA	4 hours non stop , Hi Speed race turns, Black diamond, double black, and Blue runs. Same glide at end of four hours was the same as the first . Same glide as day 1. No stick on wet. Which is very good.	10	52 -> 43	22-> 37	Sunny from 5 to 7 pm est Then Nighttime	18	Daylight-Packed wet Frozen granular, Old snow, old manmade. Night, loose frozen granular Daylight Machined Groomed loose granular corn old manmade, dirty some brown and thin spots	
wear resistance/ durability DAY3 at Ski Roundtop PA	4 hours non stop , Hi Speed race turns, Black diamond, and Blue runs. Same glide at end of four hours was the same as the first . Same glide as day 1. No stick on wet. Which is very good.	10	47 -> 55	60 -> 50	Sunny	36	New , Man made, old, Spring, Frozen granular, Loose granular, ice	
Total Duration HRS and Miles	12 hours, 48 Miles	10	28 -> 55	22 -> 60	SUN/Clouds/Night	9 -> 36		

Overall Comment Exceptional Durability, FAST 10

RACE TESTING

RUB ON 3/17/2007, 2 runs with (Nobi Red/Hertle super hot sauce, felix with NOTWAX, and Fluro Powder, Hot Iron in) One run with Fluro Powder/ cork (last 2 runs my fastest , with rub on Fusion)	Race, Top to Bottom Roundtop, PA , Pace set by GOLD Medalist DIANN ROFEE	10	30	50	CLOUDY	15	New Snow Night before , on top of old man made and hard pack ICE	15	Medal	WAX
Ski Roundtop	Mar. 17, 2007	Daily Nastar	Green	40.26	32.61	Silver	NW,Not red			
				Green	40.43	33.17	Silver	NW,Not red		
				Green	40.67	33.96	Silver	NW/FLU		
				Green	39.68	30.70	Silver	Fusion		
				Green	38.90	28.13	Silver	Fusion		

SUMMARY OF USAGE relating to Weather and Snow Conditions

Temp Range 28 to 55 Degrees F
Humidity Range 22 to 60 Percent
Dewpoint Range 9 to 36 Degrees F
Sunny/ Cloudy Both
Day/Night Both

Snow Types New ,
Man made, old,
Spring,
Frozen granular,
Loose granular,
ice , dirty (dirt, pollen)

Participants – Test Data Form Phase II

ZARDOZ Fluoro + Testing Document ZARDOZ RENEGADES

Date: _____ Name: _____

Male/Female: M / F Age: _____

What is your usual wax brand: _____

WEATHER / SNOW CONDITIONS:

Time Span : _____

Temp range: _____ Wind _____ Humidity% _____ SUN/CLOUD/MIX/NIGHT

Snow Conditions: See Guide attached _____

APPLICATION

Category	Yes or No	Rating scale. 1 worst 10 best, compared to your usual wax. Usual wax = 5
HOT WAX APP:		
Ease of application	Easy, moderate, Hard (pick)	
Smoke Y/N		
Scrape off	-----	
Overall rating		
RUB ON APP:		
Ease of application	Easy, moderate, Hard (pick)	
Ease of buff	Easy, moderate, Hard (pick)	
Overall rating		

ADDITIONAL COMMENTS:

ON SNOW PERFORMANCE:

Category		Rating scale. 1 worst 10 best, compared to your usual wax. Usual wax = 5
Glide Static / from stop		
Glide Dynamic / while moving		
Sticky	Yes/NO	
Overall Glide		
Longevity How many days	1, 3, 5 , + days circle	
Did you apply Liq Notwax	Yes/No	

RACE PERFORMANCE:

Category		Rating scale. 1 worst 10 best, compared to your usual wax. Usual wax = 5
Glide Static / from stop		
Glide Dynamic / while moving		
Sticky	Yes/NO	
Overall Glide		
Longevity During Race	1, 3, 5 , + days circle	
Did you apply Liq Notwax	Yes/No	

Snow conditions reporting terminology

The terms and definitions below are used by many North American ski resorts to describe snow conditions. The resorts describe this as a "universal language," which is true in the sense that most resorts use the same terminology. Check out your resort's [snow conditions!](#) The definitions are courtesy of the New England Ski Areas Council.

Term	Abbreviation	Definition
Average Base Depth	-	An average of the high and low amounts of snow over the entire ski area (<i>or on a particular trail. -ed</i>). Machine-made and natural snow amounts are combined.
Primary Surface Condition	-	The type of snow condition which covers at least 70% of the terrain open to skiers.
Powder	PDR	Cold, new, loose, fluffy, flaky and dry snow which has not been compacted.
Packed Powder	PP	Powder snow, either natural or machine-made, that has been packed down by skier traffic or grooming machines. The snow is no longer fluffy, but is not so extremely compacted that it is hard.
Machine Groomed Snow	MGS	Loose granular snow that has been repeatedly groomed by power tillers so that the texture is halfway between LSGR and PP. Some of the snow is granular and has been so pulverized that the crystals are like powdered sugar. It's neither LSGR or PP. This condition occurs only after a warm/freeze with multiple grooming passes.
Wet Snow	WETSN	Powder or packed powder snow that has become moist due to a thaw or rainfall, or snow which was moist when it fell.
Wet Packed Snow	WETPS	Natural or machine-made snow that has been previously packed and becomes wet usually because of rainfall.
Loose Granular	LSGR	This surface results after powder or packed powder thaws, then refreezes and re-crystalizes, or from an accumulation of sleet. This is also caused by machine grooming of frozen or icy snow.
Frozen Granular	FRGR	This is undoubtedly the most misunderstood surface condition in ski reporting. It is defined as a hard surface of old snow formed by granules freezing together after rain or warm temperatures. Frozen granular will support a ski pole stuck into its surface while ice will chip away and not support a pole.
Wet Granular	WETGR	Loose or frozen granular snow which becomes wet after rainfall or high temperature.
Ice	ICY	Not to be confused with frozen granular, ice is a hard, glazed surface created either by freezing rain, ground water seeping up into the snow and freezing or by the rapid freezing of snow saturated with water from rain or melting. Ice will chip away and not support a ski pole when stuck into it.
Variable Conditions	VC	When no primary surface (70 percent) can be determined, variable conditions describe a range of surfaces that a skier may encounter. Parts of trails can be Loose Granular, partly Packed Powder, and parts Frozen Granular, for example.
Corn Snow	CORN	Usually found in the spring, Corn Snow is characterized by large, loose granules during the day, which freeze together at night, then warm up again and loosen during the day.
Spring Conditions	SC	This is the spring version of Variable Conditions. It is used when no one surface can describe 70 percent or more of the open terrain.

List of Selected Testers:

NASTAR RANKING 2007

Regis #	days raced	Competitor	Hometown/State	Team Points
WHI26	2	Gary M Whitmore 2	Crofton, MD	9.48
CLO89	45	Paul G Clothier 45	Stevensville, MD/CO	9.36
DRA33	5	Lisa R Draper 5	Dunkirk, MD	9.25
CLO90	45	Carol S Clothier 45	Stevensville, MD / CO	9.24
MON39	4	David H Monroe 4	Reston, VA	8.95
BUR1269	3	Jo Ellen Burford 3	Manassas, VA	8.81
BUT266	10	Robert W Butler 10	Burtonsville, MD	8.17
BUR519	4	Steven R Burford 4	Manassas, VA	7.89

TEST LEAD:

ED 'Birdmon' Fowler, CMMI-II

East & West Coast testers

3 Females, 6 Males

Top 2% in NASTAR Rankings last year

Combined years of experience: 100 years +

APPLICATION DIRECTIONS:

PREP BASE and edges as usual

- Clean using SUPER Z, Base cleaner, or Acetone (no flames!)
- Repeat cleaning of base
- Wipe down with wet towel, Dry with cloth.

IRON ON

- Use aluminum foil to cover iron base.
- Set iron to 2, low as possible top melt. Do not let smoke.
- Scrape after 20 mins best if left over night before scrape
- Buff and brush as you normally do.

RUB ON

- Wipe base with napkin, towel etc.
- Rub in wax make 3 passes
- Buff base with scotch bright type fiber pad

ZARDOZ NOTWAX LIQUID

Can be added as felix process or overlay:

Felix process:

After prep and clean, apply Notwax, Hotwax,
After scrape, brush, and apply Notwax again.

Overlay:

Apply on top of base as needed.

ZARDOZ Notwax Fluoro + Testing Document ZARDOZ RENEGADES

Date: March 1, 2008 Name: Steve Burford

Male/Female: M/F Age: 57

What is your usual wax brand: Swix

WEATHER / SNOW CONDITIONS:

Time Span: 1-5 PM
 Temp range: 40° Wind 30 mph Humidity% 40% SUN/CLOUD/MIX/NIGHT
 Snow Conditions: See Guide attached mgs + L's gr

APPLICATION

Category	Yes or No	Rating scale. 1 worst 10 best, compared to your usual wax. Usual wax = 5
HOT WAX APP:		
Ease of application	<u>Easy, moderate, Hard (pick)</u>	<u>9</u>
Smoke Y/N	<u>no smoke</u>	<u>8</u>
Scrape off	-----	
Overall rating	<u>excellent</u>	
RUB ON APP:		
Ease of application	Easy, moderate, Hard (pick)	<u>N/A</u>
Ease of buff	Easy, moderate, Hard (pick)	<u>A</u>
Overall rating		

ADDITIONAL COMMENTS:

seems to melt into a liquid more than any other wax I've tried
not real hard to rub

ON SNOW PERFORMANCE:

Category	Yes/NO	Rating scale. 1 worst 10 best, compared to your usual wax. Usual wax = 5
Glide Static / from stop		<u>9</u>
Glide Dynamic / while moving		<u>9</u>
Sticky	<u>Yes/NO</u>	
Overall Glide		<u>9</u>
Longevity How many days	<u>1, 3, 5, + days circle</u>	<u>on abrasive snow</u>
Did you apply Liq Notwax	<u>Yes/No</u>	

RACE PERFORMANCE:

Category	Yes/NO	Rating scale. 1 worst 10 best, compared to your usual wax. Usual wax = 5
Glide Static / from stop		<u>9</u>
Glide Dynamic / while moving		<u>9</u>
Sticky	<u>Yes/NO</u>	
Overall Glide		<u>9</u>
Longevity During Race	<u>1, 3, 5, + days circle</u>	
Did you apply Liq Notwax	<u>Yes/No</u>	<u>9 applied Liquid Notwax when warm as overlay</u>

ZARDOZ Notwax Fluoro + Testing Document ZARDOZ RENEGADES

Date: March 1, 2008 Name: Jo Ellen Burford

Male/Female: M/F Age: _____

What is your usual wax brand: _____

WEATHER / SNOW CONDITIONS:

Time Span : 1-5 PM

Temp range: 40° Wind 30 Humidity% 55% SUN/CLOUD/MIX/NIGHT

Snow Conditions: See Guide attached mgs 15gr

APPLICATION

Category	Yes or No	Rating scale. 1 worst 10 best, compared to your usual wax. Usual wax = 5
HOT WAX APP:		
Ease of application	Easy, moderate, Hard (pick)	
Smoke Y/N		
Scrape off	-----	
Overall rating	<i>excellent</i>	
RUB ON APP:		
Ease of application	Easy, moderate, Hard (pick)	<i>N/A</i>
Ease of buff	Easy, moderate, Hard (pick)	<i>A</i>
Overall rating		

ADDITIONAL COMMENTS:

lowest handicap of year 19 - platinum

ON SNOW PERFORMANCE:

Category		Rating scale. 1 worst 10 best, compared to your usual wax. Usual wax = 5
Glide Static / from stop		
Glide Dynamic / while moving		
Sticky	Yes/NO	
Overall Glide		
Longevity How many days	1, 3, 5, + days circle	
Did you apply Liq Notwax	Yes/No	

RACE PERFORMANCE:

Category		Rating scale. 1 worst 10 best, compared to your usual wax. Usual wax = 5
Glide Static / from stop		<i>10</i>
Glide Dynamic / while moving		<i>10</i>
Sticky	Yes/NO	
Overall Glide		
Longevity During Race	1, 3, 5, + days circle	
Did you apply Liq Notwax	Yes/No	