

Z-Car Club of Washington  
18505 Alderwood Mall Pkwy. Suite # 1-419  
Lynnwood, WA 98037-8013



TO:



# The *NewZ*letter

of the Z-Car Club of Washington

Vol. XXIII, No. I

February, 1998

Next Meeting: Red Hook Brewery - Woodinville • 28 February 1998 at 3:30



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Prez Sayz

With this month's issue of The NewZletter comes a reminder that this may be your last issue. Since the membership year for the club runs from January to December, many of you who have not renewed your membership are looking at your last issue. However, that can easily be changed by filling out the membership application that can be found on the inside back page and sending it in.

For those of you who were in attendance at the January meeting, I hope you you found that there being less business to be dealt with that it was more enjoyable. I strongly feel that having more time for Z-talk makes the meetings more involving for everyone. If you did not make it, please try to make it to future meetings. I believe you will find the change pleasurable. Some of us have Z videos we can show - when the meeting location permits - such as the History Channel documentary on Z's (as shown at the last meeting), part of a promotional video on the Nissan Altima that has information about Mr. K, and two of the video tapes done by Scott Bruning ("FI Simplified" and "Datsun 240Z Tuneup"). The Bruning tapes are 2+ hours and, if interested, can be cued to the appropriate areas.

You can begin look forward to having more club activities. Starting in February, we are planning on having, in addition to the club meeting, at least one other activity. We are looking at having something as a regular activity on the second Saturday of the month.

On the 14th of February - yes, on Valentine's - we will be having a bit of a cruise. For those in the North end, we can meet in Snohomish at 11:30 at Harvey Airfield. We'll drive the backroads to Kirkland and meet at Spuds on Juanita Drive at 1:00 for lunch. There is not an established meeting location to begin the drive from the South end, but if you are interested in meeting, please join us.

Also in February, we will be having a tech session at Duane's shop, Motorworks, Ltd., on the 21st. The topic will be Transmission R&R and Input Shaft gasket and Seal replacement on a '77 280Z. Motorworks, Ltd. is located at 12700 Bel-Red Road, Bellevue. Phone 453-7082

If you have ideas for future activities, let us know. There has been interest expressed from the NorthWest Datsun Enthusiasts to co-host a track event. Stay-tuned for more details as racing season approaches.

Editor Wanted: Many will recall from a past issue of The NewZletter that Editor James Lux has been asking for some assistance with articles. I must say that I appreciate everyone's assistance with this. However, I must report that James, having become overwhelmed with work duties, needs to pass this responsibility along. To that end, if anyone is interested, please contact me to discuss details.

Have you ever wondered where future meeting locations are going to be held? Well, we have established the roving meeting locations for, pretty much, the end of the year. I'll be sure to include this information in the calendar.

Z-Ya!



ZCCW Membership Application

Annual dues: Individual = \$25; Family = \$30; Associate = \$15\*

First year membership dues prorated if joined after first 1/2 of the year for new members. i.e.:

Table with 3 columns: Membership Type, January - June, July - December. Rows for Individual, Family, Associate.

\*Associate membership is for those whom it would not be feasible to be able to attend any meetings or events.

Associate members in the United States will receive the printed version of The NewZletter

To join, fill out application and send with payment to:

Z-Car Club of Washington

18505 Alderwood Mall Pkwy. Suite # 1-419 Lynnwood, WA 98037-8013

Membership Type selection box with options: Individual, Family, Associate.

Form fields for New Member? and Update? with checkboxes.

Name(s): Birthdate(s):

Address: City:

State: ZIP: E-Mail:

Phone:

Z-Car 1: Color: Year: Model:

Z-Car 2: Color: Year: Model:

Z-Car 3: Color: Year: Model:

What area(s) of the club are you interested in?

Technical/Mechanical: Showing my Z(s): Rallying:

Cruises: Autocross: Other:

The NewZletter

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Do You Have Z Parts or Z's For Sale?  
Are You Looking For That Certain Part or Z?

Advertise them here in *The NewZletter!*

Call Michael at: 360.424.8643 or email: [mwhite@sos.net](mailto:mwhite@sos.net)

Does anyone out there have a wheel cover (called hub cap by my generation) for my '73 Z? Also can anyone recommend someone who can reinstall my radio. I know it's a simple job, I just don't want to do it! Preferably someone in Wenatchee or North Central Washington. Don Mollet, 131 Bogey Blvd., Chelan, WA, 509-682-5290, Email: [betdon@kozi.com](mailto:<betdon@kozi.com>).

(4) Enkei (eight-spoke Panasport/Minilite style) wheels w/ mounted 215/60-14 Goodyear Eagle GT+4 tires with only 10K miles. Four-bolt pattern for 240Z through 280ZX. All in excellent condition. Retail at \$1400. \$600 obo. Leigh L'Heureux <[leigh.lheureux@pss.boeing.com](mailto:leigh.lheureux@pss.boeing.com)> 425-294-7445.

Parts for sale. 240Z: chrome plated steering gear housing, side rods and compression rods. \$25.00; 4-sp transmission (includes shift lever, clutch cylinder etc) \$25.00; pressure plates (2) \$5.00 ea.; clutch/brake pedal assembly. \$10.00; half shaft (1). \$5.00. 260Z: elect fuel pump assy. \$5.00; Jim Phelps, Arlington, WA, 360-435-6845 <[JimTrish@worldnet.att.net](mailto:JimTrish@worldnet.att.net)> .

For Sale, set of 7.5 by 16" Centerline aluminum wheels with Yoko 225/50-16's. Wheels need cleaning but no dings or curb rash. \$600. Consider part trade for band saw or wire welder. Located Seattle area. Don't want to ship them. Can deliver as far south as Portland, OR. Jim 360-221-3170, <[jameslux@whidbey.com](mailto:jameslux@whidbey.com)>.

Wanted: I am looking for a 3-piece rear spoiler for my 280z, locally only please. Contact Shawn at <[vman@seanet.com](mailto:vman@seanet.com)>.

280Z Engine, Tranny and Wheels - 1976 280Z fi engine and 4 speed tranny. Runs fantastic, hear it run now, will be available about end of January. Includes complete fuel injection system, starter, alternator, 4 speed manual, clutch, pressure plate, manifolds. \$800.00. 4 -14x5" slotted directional alloy wheels with 195/70r14, includes "3 bar Knock off" center caps, tires still in good shape. \$300.00 for the set. Nothing wrong with this gear, I'm just converting to V8. Contact Dana by email at <[danag@fidalgo.net](mailto:danag@fidalgo.net)>.



I am selling my 1983 280ZX. I have spent many dollars and hours fixing it up (and loved every minute of it). I am keeping my 240z (the next project) and I am buying a 1990 300ZX Twin Turbo. Here is a list of the upgrades done to the 280ZX since March 1997:

Replaced Rear deck seal (it was rotted and leaking), Replaced various lights, taillight lens, Complete lube job/oil change/radiator flush, New spare tire and cartridge/rear wiper fixed, BRAND NEW STRUTS AND SHOCKS (and 4-whl align), Body work (rust prevention, scratch removal, dings fixed), \*\* BRAND NEW PAINT JOB (very nice too!), Warrantied for 2 years!, New clutch, master and slave cylinders, New top-of-the-line Sears Die hard battery, Recovered various interior panels with new vinyl, Brand new carpet installed, Repaired Air Conditioning (IT blows very cold), Replaced alternator, starter, and fuel injectors, New spark plug wires, Various screws, plastic pieces, and emblems to perfect the interior of the car.

This car is PRIMO now, and runs smooth and like a dream. There's a lot more, I just can't think of them while I'm writing this. Not to mention all the TLC I've put into the car. :). E-mail me at <[kelly@lightningweb.com](mailto:kelly@lightningweb.com)> if you want to make me an offer for it. You can also call me, Greg, at 213-0964.

## Datsun 240Z

The following article is from the Summer 1971 edition of *Automobile Quarterly*.

Wanted! The Datsun 240Z by just about everybody who ever drove one.

Reward! Some of the best times you'll ever spend behind a wheel.

Generally around these offices we are pretty much removed from the Car-of-the-Month hoopla that is a semi-permanent fixture in the newsstand automotive jungle.

This is not to say that we disapprove of that kind of publication—in fact, there is one in particular that we admire greatly: John Bond's *Road & Track*.

But any monthly automotive magazine's objectives must be rather different from those of a quarterly, so it is a fairly rare occasion when we would feature a contemporary production car, and then only when we simply can't resist it any longer. Like now, for instance.

The Datsun 240Z hits its particular import market bulls-eye with such a wallop that its competitors will probably never recover. Who are its competitors? Well, it doesn't have any, really, but the small, sporty GT's that are up against it (in every sense) include the Opel GT (nice but it looks funny), the MGB GT (a quite attractive exterior, we think, but from a mechanical viewpoint it could have come off the Ark), the Fiat 124 Sport (a very pleasant car indeed, but not too much performance), and a number of clunkers which we probably shouldn't mention.

The only contender that can bear serious comparison with the 240Z is the GTV Alfa, a great automobile in many ways but the times they are a changin'—and the GTV, born in 1965, is beginning to show its age. It also costs around \$900 more than the Datsun, which itself could quite justifiably cost \$1000 more than it does.

In fact the price of this Datsun is by far the most remarkable thing about it. There's nothing particularly astonishing about strong, silky-smooth sohc six-cylinder engines, coil sprung four-wheel

independent suspension, perfectly modulated power-assisted disc brakes (drums at rear), cornering and controllability that have to be graded as



super, and crisp, contemporary styling. But to encounter all these features in a \$3600 package is to realize how well those devilishly clever Nipponese product planners have assessed the market over here and then built precisely the right car for it, at an almost unbelievable price. There's simply nothing else in the 240Z's league. Period.

We are not alone, of course, in being awed by the Z. We don't know of another imported car, with the possible exception of the Rolls-Royce Silver Shadow, that is so far behind in delivery on firm orders. If you live in a large metropolitan area and order one right now you might take delivery of it in eleven months. Then again you might not.

And they're building them as fast as they can in Japan. In fact, an entire factory, which was formerly engaged



in the production of Datsun's 1800 and 2000 sports cars, has been shifted over exclusively to 240Z pro-

duction, so they're now producing something like a hundred units daily. The factories never shut down; they're working full blast in three eight-hour shifts around the clock, but still they can't keep pace with the demand.

The U.S. Market represents around ninety percent of the total 240Z production, so something like 32,000 units will have been delivered here by the end of 1971. Datsun's U.S. head office in Gardena, California, estimates that if they could only get them they could deliver three or four times that many by the year's end.

As with many cars in great demand and short supply, there are some dealers who are loading 240Z's with every imaginable kind of option and offering them to their customers on a take-it-or-leave-it basis. There are also an unfortunate few who for an extra "fee" will arrange for an earlier delivery date. Naturally the importers take a decidedly dim view of these shenanigans, and seventeen kinds of woe may betide any dealer caught at it—to the possible extent of losing his franchise.



One of the nicest guys we know happens to be a Datsun dealer, and (dare we say it!) a scrupulously honest one. "If you plan to establish any kind of a reputation, it's the only way to operate," says Bob Sharp, whose immaculate dealership can be found up in Wilton, Connecticut, about an hour out of New York. "People come in and ask how much it will cost to move up a few places on the waiting list. They seem pretty surprised when we

tell them we're not interested." An actual waiting list does indeed exist, and is posted boldly in the showroom so impatient customers can watch their names inching toward the top.

If Bob's name seems familiar to you, it could well be that you remember it from race reports; for eight years he has been winning S C C A Divisional Championships with Datsuns. You may even have

been unfortunate enough to have raced against his new 240Z in C-Production this year. If you did then you are probably looking forward to next season with mixed feelings because you'll remember that he won production races this year at Bridgehampton, Cumberland, Lime Rock (twice), Thompson, Pocono and Watkins Glen, sewing up still another Divisional Championship without even looking like he was going to lose any of them. (To relieve those spans of tedium between C-Production events Bob also wields a Datsun 510 which he had prepared for SCCA B-Sedan races. Development took most of this season, but no nobody can catch that one either.)

The road-going Z on the preceding pages is Bob's personal car. he's altered it only to the extent of adding air conditioning (expensive!), switching to the optional seven-inch-wide lightweight wheels with 175 SR14 Bridgestone radials (Japanese Firestone), a slightly stiffer than standard anti-roll bar at the front and the optional non-polluting dual exhaust.

Brand	VI	Flash	Pour	%ash	%zinc	Red Line	149	495	-40	—	—
20W-50						Shell Rotella w/XLA*	146	414	-32	1.0	.12
AMSOIL*	151	507	-45	—	—	Valvoline All Fleet	140	—	-10	1.0	.15
AMSOIL Series						Valvoline DuraBlend	137	450	-17	<1.5	.125
2000*	155	474	-47	—	—	Valvoline Turbo	140	420	-10	.99	.13
Castrol GTX*	122	440	-15	.85	.12						
Castrol Syntec						10W-30					
Blend*	135	440	-17	—	.105	AMSOIL*	171	464	-54	—	—
Chevron Supreme*	140	428	-17	<1	—	Castrol GTX*	143	415	-32	1.07	.12
Exxon High						Castrol Syntec					
Performance	119	419	-13	.70	.11	Blend*	138	415	-33	—	.105
Havoline Formula 3	117	480	-27	.78	—	Castrol Syntec*	157	455	<-54	—	.102
Kendall GT-1	129	390	-25	1.0	.16	Chevron Supreme*	150	419	-27	<1	—
Pennzoil GT Perf.	120	460	-10	.9	—	Exxon Superflo Hi					
Quaker State Perf.*	121	440	-20	—	—	Perf	135	392	-22	.70	.11
Quaker State						Exxon Superflo					
Motorcycle	140	440	-25	—	—	Supreme	133	400	-31	.85	.13
Red Line	150	503	-49	—	—	Havoline Formula 3	135	430	-36	.78	—
Shell Fire and Ice*	126	450	-10	.9	.12	Kendall GT-1	139	390	-25	1.0	.16
Shell Truck Guard*	130	450	-15	1.0	.12	Mobil 1	160	450	-65	—	—
Spectro Golden 4	174	440	-35	—	.15	Pennzoil PLZ Turbo	140	410	-27	1.0	—
Spectro Golden M.G.	174	440	-35	—	.13	Quaker State*	140	410	-30	.9	—
Ultra Chem	190	455	-34	—	—	Quaker State 4x4*	135	430	-35	—	—
Unocal	121	432	-11	.74	.12	Red Line*	150	475	-40	1.4	.13
Valvoline All Climate	125	430	-10	1.0	.11	Shell Fire and Ice*	155	410	-35	.9	.12
Valvoline Turbo	140	440	-10	.99	.13	Shell Rotella w/XLA*	155	405	-37	1.0	.12
Valvoline Race	140	425	-10	1.2	.20	Shell Truck Guard*	155	405	-35	1.0	.12
Valvoline DuraBlend	126	455	-17	<1.5	.125	Spectro Golden M.G.	175	405	-40	—	—
Valvoline Synthetic	146	465	-40	<1.5	.12	Unocal Super	153	428	-33	.92	.12
						Valvoline All Climate	130	410	-26	1.0	.11
15W-50						Valvoline Turbo	135	410	-26	.99	.13
Mobil 1	170	470	-55	—	—	Valvoline Race	130	410	-26	1.2	.20
Mystic JT8	144	420	-20	1.7	.15	Valvoline DuraBlend	142	440	-27	<1.5	.125
Red Line	152	503	-49	—	—	Valvoline Synthetic	140	450	-40	<1.5	.12
5W-50						5W-30					
Castrol Syntec*	175	465	<-54	—	.102	AMSOIL*	186	478	-67	—	—
Chevron Supreme*	175	460	-38	1.45	—	Castrol GTX*	160	410	-35	1.35	.12
Quaker State						Chevron Supreme*	167	410	-38	<1	—
Synquest*	175	460	-50	—	—	Chevron Supreme					
Pennzoil Performax	176	—	-69	—	—	Synt.*	169	468	-49	—	—
						Exxon Superflow HP	148	392	-22	.70	.11
5W-40						Havoline Formula 3	154	415	-36	.78	—
Havoline	170	450	-40	1.4	—	Mobil 1	165	445	-65	—	—
						Mystic JT8	161	390	-25	.95	.1
15W-40						Quaker State*	155	405	-35	—	—
AMSOIL*	165	462	-49	—	—	Quaker State					
Castrol	134	415	-15	1.3	.14	Synquest*	168	450	-58	—	—
Chevron Delo 400*	134	424	-38	<1	—	Red Line*	165	455	-49	1.4	.13
Exxon XD3	—	417	-11	.9	.14	Shell Fire and Ice*	167	405	-35	.9	.12
Exxon XD3 Extra	135	399	-11	.95	.13	Unocal	151	414	-33	.81	.12
Kendall GT-1	135	410	-25	1.0	.16	Valvoline All Climate	135	405	-40	1.0	.11
Mystic JT8	142	440	-20	1.7	.15	Valvoline Turbo	158	405	-40	.99	.13
Quaker State*	129	420	-25	—	—	Valvoline DuraBlend	162	415	-38	<1.5	.125
Quaker State HDX*	146	440	-30	.97	—	Valvoline Synthetic	160	435	-40	<1.5	.12
Quaker State HDX											
Plus*	148	420	-25	1.37	—						

revving, air cooled motorcycles or turbo charged cars or bikes might want to look at the oils with the higher zinc content. More doesn't give you better protection, it gives you longer protection if the rate of metal to metal contact is abnormally high.

The Data: (Note: this data is mostly from 1991 and is for SG rated oils. Some of the data is current, and I am working on collecting the most recent data. I have found over the years that the "better" oils remain the "better" oils. It is still valid as a place to start in your own search. The formulation of oils is constantly being updated and subject to change by the manufacturer at any time. The best thing to do is collect data on the oils you are interested in directly from the oil company.) [An \* after the oil name indicates current SH rated version.]

Listed alphabetically — indicates the data was not available [chart on page 17]

All of the oils above meet current SG/CD ratings and all vehicle manufacturer's warranty requirements in the proper viscosity. All are "good enough", but those with the better numbers are icing on the cake.

The synthetics offer the only truly significant differences, due to their superior high temperature oxidation resistance, high film strength, very low tendency to form deposits, stable viscosity base, and low temperature flow characteristics. Synthetics are superior lubricants compared to tra-

ditional petroleum oils. You will have to decide if their high cost is justified in your application.

The extended oil drain intervals given by the vehicle manufacturers (typically 7500 miles) and synthetic oil companies (up to 25,000 miles) are for what is called normal service. Normal service is defined as the engine at normal operating temperature, at highway speeds, and in a dust free environment. Stop and go, city driving, trips of less than 10 miles, or extreme heat or cold puts the oil change interval into the severe service category, which is 3000 miles for most vehicles. Synthetics can be run two to three times the mileage of petroleum oils with no problems. They do not react to combustion and combustion by-products to the extent that the dead dinosaur juice does. The longer drain intervals possible help take the bite out of the higher cost of the synthetics. If your car or bike is still under warranty you will have to stick to the recommended drain intervals. These are set for petroleum oils and the manufacturers make no official allowance for the use of synthetics. Some oil companies, AMSOIL being an example, offer their own engine warranties. If the oils are used in compliance with the company's recommendations (including extended drain intervals) and a problem is caused by the engine oil, the company will pay for the repairs. Check with the company for specifics of any warranties offered.

Oil additives should not be used. The oil companies have gone to great lengths to develop an additive package that meets the vehicle's requirements. Some of these additives are synergistic, that is the effect of two additives together is greater than the effect of each acting separately. If you add anything to the oil you may upset this balance and prevent the oil from performing to specification.

The numbers above are not, by any means, all there is to determining what makes a top quality oil. The exact base stock used, the type, quality, and quantity of additives used are very important. The given data combined with the manufacturer's claims, your personal experience, and the reputation of the oil among others who use it should help you make an informed choice.

Continued on next page

The first impression from behind the wheel is one of relaxing order. There are some cars that one can never feel at home in, but this one feels like an old friend immediately. The seating position and placement of the steering wheel is just right, and the pedals have long, smooth throws and are well separated.

Twisting the key produced one of the most **s e n s u o u s** automotive noises we've heard since the XK-120. The dual exhaust system for the Z costs around \$200 including manifolds, mufflers, pipes and installation. If you're considering ordering a Z you might find the money well spent. With that kind of music built in you may never listen to the radio.

Of course the 240Z is a joy to drive. We don't see any point in filling these pages with a plethora

## What exactly to the oil numbers mean?

I'm sure you have seen the numbers before but have you ever wondered what they were all about? Tony Zampini prompted the following discussion on the Z-Car List.

I've worked on cars all my life, but I have to admit that I've never really understood the viscosity designations of motor oil. Can those of you who know fill me in?

I mean I know that a heavier weight oil is more viscous than a lighter weight oil, but what, for example does 10W40 mean? Does it mean that the oil is equivalent to a straight 10W oil at some particular hot temperature, and to a 40W oil at some particular cold temp.? And what is a straight 30W oil? I find it hard to believe that it has the same viscosity at all temperatures.

of g-loads and acceleration times. The Z has already been thoroughly tested by automotive monthlies from one end of the country to the other, and the fact that it is by far the fastest imported car in anywhere near its price class is known far and wide. But we might add our own voice to the chorus singing the praises of the 240Z's handling. We've never driven a front-engined machine that felt more nimble and stable



under very hard braking and cornering. It's an extremely safe, beautifully balanced car that deserves every bit of

the praise that has been heaped upon it. As it stands the car pictured here, with all its options installed, retails for \$4636. You can have one just like it—if you're prepared to wait.

—Z

To which Jim Morford replied:

I would recommend checking out the ever popular OIL FAQ for all you ever wanted to know about OIL. I've attached it here.

## More Than You Ever Wanted to Know About Motor Oil

by Ed Hackett

Choosing the best motor oil is a topic that comes up frequently in discussions between moto-heads, whether they are talking about motorcycles or cars. The following article is intended to help you make a choice based on more than the advertising hype.

Continued on page 13

*Get Connected  
Stay in Touch with  
Fellow Members*

*with the*

## ZCCW Email List

To subscribe,  
send an email message to:  
zccw-request@sos.net  
with "subscribe" in the subject line  
(sans quotes) leaving the body blank.  
To send a message to the list, send it  
to: zccw@sos.net

## Z-Store Vintage Z Update

From Nissan Corporate

### Greetings from the Z-Store at Nissan Corporate!

This update is intended to shed some light on what the Z-Store program has been achieving over the past four months.

By the time you read this, Nissan Motor Corp. USA will have delivered 25 cars, with six to seven cars scheduled for delivery in February. As you may recall, several of the first cars delivered were for special programs, such as a "press car" reserved for journalists; and another which was given away by Nissan to benefit several Northern California charities. Auctioned by Rick Cole at last year's Monterey Historic Races/Pebble Beach Concours weekend, VIN HLS30-00630 went for \$35,000, quite a bit higher than the Vintage Z MSRP of \$28,125.00, and a fair indicator of the demand for these restored cars. This particular car actually went back to Japan, as have several others. Indeed, several of the buyers of our Vintage Z's hail from foreign countries, as on Z has gone to live in London, while another went to the United Arab Emirates in the Middle East.

Our 10 Z-Stores remain committed to the program. We have three in California (Universal and Performance in the "extended" Los Angeles area, and Stevens Creek in Northern Calif.); three in Florida (Ferman [formerly Sutherlin] in Tampa, Coggin in Jacksonville, and Esserman in Miami); two in Texas—both in the Dallas metro area, with Bankston in Irving and Courtesy in Richardson; one in Georgia (George Sutherlin in Marietta); and one in Northern Virginia (Brown's Fairfax).

As you all know, Pierre Perrot, proprietor of Pierre' Z Center, has provided the "magic" to this entire mix. He and his band of craftsmen have done some great work on all the cars, and as demand continues to grow, has answered the call to expedite completion of more cars. His dedication to the Z-Store program has been both genuine

and most welcome. A quick nod also to Les Cannady for his contributions.

Speaking of production, we are pleased to announce that we have added two more restoration companies to the Z-Store program. Old Car Service of Huntington Beech, whose owner Terry Stokes, has a long history with the Z, has joined us. He currently has two cars in his facility, and is preparing to receive another three.

Marc Jones, longtime proprietor of Datsun Alley in Signal Hill (Long Beach area), is the latest Z-Store restoration partner. Marc presently has only one car in a nearby bodyshop awaiting paint, and has disassembled his second car at his shop. We look forward to the end results from both Marc and Terry, as we anticipate adding more cars to the "stream."

You can see that we are in the midst of "ramping up" production in order to accommodate all our dealers and their customer requests. We know there is a profound desire to generate more cars. However, each car is a true labor of love, and we feel it is important to be able to provide specific paint choices and model years, as desired by our buyers. Presently, we are only able to offer the black interior, but we are looking at the possibility of having another color choice in the near future. We have found a company that has developed tooling to manufacture new interior components, from the carpeting to sun visors, and we are very pleased with their work.

Funding for 1998 budget (Nissan's fiscal years run April 1 through March 31) has been approved, and we're on our way to building more cars, as well as buying a few more "prospects" (sorry, but we're limiting our search to Southern California due to the self-imposed ceiling on purchase price). We anticipate conducting a few promotions during the course of the coming year, and will certainly be in attendance at the National Z Convention in New Mexico.

SAE Gear Viscosity Number				
75W	80W	85	90	140
SAE Crank Case Viscosity Number				
10	20	30	40	50
2 4 6 8 10 12 14 16 18 20 22 24 26 28 30 32 34 36 38 40 42				
viscosity cSt @ 100 degrees C				

Flash point is the temperature at which an oil gives off vapors that can be ignited with a flame held over the oil. The lower the flash point the greater tendency for the oil to suffer vaporization loss at high temperatures and to burn off on hot cylinder walls and pistons. The flash point can be an indicator of the quality of the base stock used. The higher the flash point the better. 400 F is the minimum to prevent possible high consumption. Flash point is in degrees F.

Pour point is 5 degrees F above the point at which a chilled oil shows no movement at the surface for 5 seconds when inclined. This measurement is especially important for oils used in the winter. A borderline pumping temperature is given by some manufacturers. This is the temperature at which the oil will pump and maintain adequate oil pressure. This was not given by a lot of the manu-

facturers, but seems to be about 20 degrees F above the pour point. The lower the pour point the better. Pour point is in degrees F.

% sulfated ash is how much solid material is left when the oil is reacted with sulfuric acid and burned. This is used to quantify the amount of metallic antiwear and detergent additives in the oil. Zinc dithiophosphate is a common detergent and antiwear additive that is reflected in this test.

% zinc is the amount of zinc used as an extreme pressure, anti-wear additive. The zinc is only used when there is actual metal to metal contact in the engine. Hopefully the oil will do its job and this will rarely occur, but if it does, the zinc compounds react with the metal to prevent scuffing and wear. A level of .11% is enough to protect an automobile engine for the extended oil drain interval, under normal use. Those of you with high



## Z-Club T-Shirts



Back



Front

The Z-Car Club of Washington is pleased to announce the availability of Club T-Shirts! They come in ash-colored 100% pre-shrunk cotton in medium, large, extra-large, and double-extra-large sizes.

To order, send money order or check payable to the Z-Car Club of Washington for \$18.00 per shirt (\$15 for shirt plus \$3 for S&H) to:

ZCCW T-Shirts  
2212 Alison Avenue  
Mount Vernon, WA 98273

## 50th Anniversary Floor Mats

Mary Anne Demey posted this to the Z-Car List.

Great News! Our favorite parts person at John Elway Nissan in Englewood, Colorado just called to tell me that Nissan once again has original floor mats for the 1984 300ZXT 50th Anniversary edition!

He said they are the original black carpet with the gold and black 50th anniversary medallion in the center and they should be available at any Nissan dealership!!!

## Z Club Emblem Posters

Prez Michael White is taking orders for full color posters which feature the logos of every known Z club in the world (as of July 1997) with the four generations of Z-cars (240, 10th Anniversary 280, 50th Anniversary 300, 25th Anniversary SMZ) from computer enhanced photos. The final color proof was seen at the Z Car National Convention in York. Each 24"x36" poster is \$10.00. The initial post to the IZCC, made by the Chicago Z Club, said that a limited number of posters was available, so act fast.

## History Channel tapes

Paul Hollander posted the following to the Z-Car List.

I have just ordered a copy of "The History of the Nissan Z" video from the History Channel. It is \$19.95 + \$5.00 S/H. Just call 1-800-708-1776 (1776 - History Channel, cute ;-). Just ask for the Automobiles episode on the Nissan Z. They said it should arrive in a few days. They also have ones on Mustangs, Chevy Bel Aires, Vettes, Alfas, Porches, and many others for those other enthusiasts.

## Die Cast Nissan 300ZX & Mid 4

Lou Bisogno posted the following to the Z-Car list:

In case anyone is interested, I just stopped at a Wal-Mart in New Jersey, and as usual, I was looking in the toy department for any interesting miniature cars. I happened to come across a set of Nissans. It is sold under the Road & Track brand, and it is a "Two Car Value Pack". Both cars are

bright red, one is a Nissan Mid 4, and the other is a Nissan 300ZX. The "Z" appears to be an 84-86 body style, with the squared-off tail lights. The detail is ok, no opening doors or hood. The packaging states: Road & Track Magazine-Fifty Years of Enthusiasm...and between the two cars on the blister pack, "Nissan Coupes to Be Missed"....On the back of the packaging it says: Manufactured under license from Hachette Filipacchi Magazines, Inc....Manufactured exclusively for Wal-Mart Stores, Inc. by Maisto International, Inc. Fontana, CA 92336 USA. There are two "stock" numbers, one is #15085, and the other is #17....I didn't see any more of these in this particular store. You may have luck looking in your area. Hey, where else am I gonna find two Nissans for \$1.97????? Anyway, at least I can look at these until the weather here in the Northeast allows me to take the real thing out for a spin!!!

## Funny true story...

Bob Worley brings us the following care of the Z-Car List.

From the January 12, 1998 issue of *AutoWeek*, "...but wait, there's more." page: True stories. Or At Least Good Urban Legend Dept. From Steve Orthwein at The Edge:

A woman call an import parts warehouse and asks for a 28-ounce water pump.

"A what?" says the confused parts guy.

"My husband says he needs a 28-ounce water pump."

"A 28-ounce water pump? What kind of car does it fit?"

"A Datsun."

As he writes down "Datsun 28 oz. water pump" the light in his head goes on.

"Oh, yea ma'am. We've got 28-ounce water pumps. We have 24-ounce and 26-ounce water pumps, too."

"Finally," she says. "You're the first place I've called that knew what I was talking about."

"Yes, ma'am. That's because we're a full-service parts warehouse. It's our job to have the parts you need, like a 28-ounce water pump," he says, smiling, as he jots down customer pickup, Datsun 280Z water pump, part number....

Finally, we want to thank you for your continuing interest in the Z-Store, and for your general enthusiasm for all things Z. We hope this program has helped bring new life and new interest to all Z's out there, and we anticipate that this program has increased the value of your own vehicle. Naturally, we trust you continue to enjoy your own ride.... If you have any questions, please call us at 310-771-6542.

One little commercial message: Steve Richardson, our main "guru" at Courtesy Nissan in lovely Richardson (his words), Texas, has just announced the availability of complete air conditioning kits for all vintage 240Zs. The kit comes with all components, including an updated rotary-style compressor, and is configured to use the new, U.S.-legal R-134A refrigerant. Give him a call at 1-800-527-1909.

-Z

## SU Polished Dashpot Tech

Scott Bruning posted the following to the IZCC.

Anyway, about the dashpots (the dome top of the carb). When I lived in England, the subject frequently came up about polishing the interior of the dashpot. Even some magazines endorsed it. This is unsettling to me, knowing now what I do about these carbs.

As we know, engine vacuum pulls up the piston. Piston goes up, air come in and fuel is allowed to come out the gas nozzle (black plastic "L" w/brass pipe attached). The clearance between the piston and the dashpot determines how much the piston goes up. The larger the gap, the less the piston will go up. So ideally, you would have a matched set of pistons and dashpots. Polishing increases the gap between 2 parts that were never meant to touch. If they never touch, why polish them?

What is a matched set of pistons/dashpots? Remove the needles and spring from your pistons. Cover the 2 holes on the bottom of the piston with electrical tape. Now tape up the hole on the top of the dashpot. Set the pistons on the table, place the dashpots on the pistons, and watch them drop over the piston. Both should fall at the same speed. Now repeat the test by using one finger to keep the piston up, hold the dashpot over the table, and let both pistons fall together. Both should clear the dashpot at the same time. It's a lot easier to accomplish than it is to describe.

In a perfect world, both assemblies will have the same drop speed. With Glen's unfortunate situation of one being polished and one not, I suggest finding another set of domes, or at least one to replace the polished one. Another option is to polish the unpolished one to match the drop rate. Worst case-send them to me and I will replace the pistons and dashpots with a matched set. All the carbs I remanufacture are mixed and matched until I find a set that perform the same. This drop test is the heart and soul of the carb. Piston action controls the air and fuel flow to the engine! Unequal flow means carbs that will never balance out right.

Another reminder about the 4 screw bodies- Just got in a set that had just gotten through smog (supposedly). The jamb nut for the nozzle tube was loose! I described it before, but I'm going to try it again.

## FOUR SCREW SU GAS NOZZLE ALIGNMENT PROCEDURE

Theory of operation:

1. The piston is attached to the needle.
2. The needle rests inside the gas nozzle when the throttle is closed.
3. The gas nozzle sits inside a brass tube. This brass tube is a sloppy fit inside the carb body. The

brass tube is held down by a jambnut. All of this stuff is on the bottom of the carb.

#### Symptoms:

4. Piston will not fall all the way to the floor of the throttle body. Operating the choke will let it fall.

5. Carbs will not balance out at idle (because the piston is up on one of the carbs).

#### Problem:

4. Sloppy fit of tube to body means the nozzle can be misaligned to the gas needle.

5. The alignment of the piston and needle can't be adjusted, so we must move the nozzle and it's tube around to get the alignment

#### Fix Action:

6. Do the drop test as above, then mount the needle to the piston. Needle shoulder goes flush with the bottom of the piston, not inside the groove. [The] 4 screw pistons have a very small

hole for the needle. Use a drill bit and finger spin it to clean out the hole for the needle.

7. Insert the pipe and finger tighten the jamb nut, but don't wrench on it. Don't install the spring or mushroom lookin' choke stopper/guard.

8. Mount the piston and dashpot to the body.

9. Slide in a new nozzle, hold it w/finger, and operate the piston w/other finger while everything is vertical. Does the piston go all the way down? If so, wrench tighten the jambnut. If not, spin the pipe w/fingers and try the piston fall test again. Repeat this until there is no binding.

NOTE: I've noticed on a lot of carbs that the needle is too far down, after being set with a straightedge to the bottom of the piston. How did I notice? With the nozzle installed, I could push up the nozzle and it would move the piston. Unscrewing the nozzle adjusting nut 2-1/2 turns will compensate for this. On the other hand, the gas ratio is based on the fit between the nozzle and the needle. If you feel so inclined, move the needle up until both carbs are the same.

BTW, in the interest of recasting new SU's, does anyone out there have the machine specs for the carb body, piston, and dashpot?

I'm on Zinc plater #3, and finally found someone who can replicate the bright green/yellow/purple sheen of the NOS Nissan still has around. They bake it in, and retemper the springs and lockwashers. Send me in everything on your induction system, firewall fulcrum, linkage rods, valve cover bolts, and get it back replated.

-Z



Oil companies provide data on their oils most often referred to as "typical inspection data." This is an average of the actual physical and a few common chemical properties of their oils. This information is available to the public through their distributors or by writing or calling the company directly. I have compiled a list of the most popular, premium oils so that a ready comparison can be made. If your favorite oil is not on the list get the data from the distributor and use what I have as a data base.

This article is going to look at six of the most important properties of a motor oil readily available to the public: viscosity, viscosity index (VI), flash point, pour point, % sulfated ash, and % zinc.

Viscosity is a measure of the "flowability" of an oil. More specifically, it is the property of an oil to develop and maintain a certain amount of shearing stress dependent on flow and then to offer continued resistance to flow. Thicker oils generally have a higher viscosity, and thinner oils a lower viscosity. This is the most important property for an engine. An oil with too low a viscosity can shear and lose film strength at high temperatures. An oil with too high a viscosity may not pump to the proper parts at low temperatures and the film may tear at high rpm.

The weights given on oils are arbitrary numbers assigned by the S.A.E. (Society of Automotive Engineers). These numbers correspond to "real" viscosity, as measured by several accepted techniques. These measurements are taken at specific temperatures. Oils that fall into a certain range are designated 5, 10, 20, 30, 40, 50 by the S.A.E. The W means the oil meets specifications for viscosity at various low temperatures depending on weight, and is therefore suitable for Winter use. 5W is tested at -25C, 10W at -20C, 15W at -15C, and 20W at -10C.

The following chart (page 15) shows the relationship of "real" viscosity to their S.A.E. assigned numbers. The relationship of gear oils to engine oils is also shown.

Multi viscosity oils work like this: Polymers are added to a light base (5W, 10W, 20W), which prevent the oil from thinning as much as it warms up. At cold temperatures the polymers are coiled up and allow the oil to flow as their low numbers indicate. As the oil warms up the polymers begin to unwind into long chains that prevent the oil from thinning as much as it normally would. The

result is that at 100 degrees C the oil has thinned only as much as the higher viscosity number indicates. Another way of looking at multi-vis oils is to think of a 20W-50 as a 20 weight oil that will not thin more than a 50 weight would when hot.

Multi viscosity oils are one of the great improvements in oils, but they should be chosen wisely. Always use a multi grade with the narrowest span of viscosity that is appropriate for the temperatures you are going to encounter. In the winter base your decision on the lowest temperature you will encounter, in the summer, the highest temperature you expect. The polymers can shear and burn forming deposits that can cause ring sticking and other problems. 10W-40 and 5W-30 require a lot of polymers (synthetics excluded) to achieve that range. This has caused problems in diesel engines, but fewer polymers are better for all engines. The wide viscosity range oils, in general, are more prone to viscosity and thermal breakdown due to the high polymer content. It is the oil that lubricates, not the additives. Oils that can do their job with the fewest additives are the best.

Very few manufacturers recommend 10W-40 any more, and some threaten to void warranties if it is used. It was not included in this article for that reason. 20W-50 is the same 30 point spread, but because it starts with a heavier base it requires less viscosity index improvers (polymers) to do the job. AMSOIL can formulate their 10W-30 and 15W-40 with no viscosity index improvers but uses some in the 10W-40 and 5W-30. Other multigrade synthetics may not use VI improvers either. The full literature available from the oil company should include this information. Follow your manufacturer's recommendations as to which weights are appropriate for your vehicle.

Viscosity Index is an empirical number indicating the rate of change in viscosity of an oil within a given temperature range. Higher numbers indicate a low change, lower numbers indicate a relatively large change. The higher the number the better. This is one major property of an oil that keeps your bearings happy. These numbers can only be compared within a viscosity range. It is not an indication of how well the oil resists thermal breakdown.

## Fiesta de Albuquerque

11th Annual Z-Car Convention  
July 20-25, 1998

Plan Now to Join Us for a Fun-Filled  
Week in the Great Southwest!



Datsun/Nissan Z and ZX  
And All Classic Datsun Enthusiasts  
Are Welcome!



For Registration Information Contact:  
Fiesta de Albuquerque  
Hosted by the New Mexico Z Car Club  
Michelle & John Forsman, Coordinators  
Fiesta Line: 505/323-2898  
e-mail: nmzcc@swcp.com



Online Information & Registration at:  
<http://www.swcp.com/~forsmanz/>



have fuel pump contacts in them. The flap has to move, or no fuel action!

5. Before the Server crash, I advertised the video via some tech articles. I copied them in here, in case anyone missed them. I will also have Fi schematics up on ZTherapy.com this week. Follow the Video/Fi Video link.

### Dija know?

The computer measures battery voltage, and sets the pulse width of the injectors accordingly. The colder it is outside, the lower the voltage, and the higher the amperage across the injector. If you have a weak battery, dirty terminals, or a dead alternator, you can actually fail smog because the electrical system is not seeing enough voltage!

Another tip: If your fuel pump is not working, it may not be the fuel pump! The 7 pin flowmeter has electrical contacts inside it for the pump. It is tied to the thermal time switch, cold start injector, etc.

I am going to quote Kim Blough here. This is coming from a 20+ year Nissan mechanic...The higher octanes are worth the money. Looking at the fuel requirements that are posted in your glove-box door, the cars need 87-92 octane (depending on the year). Kim says use premium. It is a better gas, and is much cheaper than a set of injectors.

Let's talk about water...Water is what kills a fuel system. Water causes your pump to eat the armature where the brushes touch (EDM). Water freezes and breaks your injectors. Water clogs up your filter. Water rusts your tank. Water does not burn! It condenses in the tanks of the gas station as well as in your tank.

"Alcohol loves water as much as water loves alcohol." The oxygenated fuels we are forced to consume are not recommended by Nissan. Avoid it at all cost if you can. The oxygenating additive is part/all alcohol. This is what kills Fi systems-water and alcohol!

Change your fuel filter often and do not use Heet gas additive. The specific gravity of kerosene

(Heet) is heavier than gasoline. Adding it to your tank only raises the gas off the bottom of the tank, where it proceeds to the fuel pump (destroying it w/in a year), then to the filter (where it clogs), and then finally onto the injectors (freeze, rust, clog).

"Does anyone have any experience with a 280 ('77) running too lean with a Weber Big Throat (& beveled intake) and a K&N air filter?"

One thing that may be causing your problem: the airflow meter. Your cam alters your engine's dynamic breathing, in essence by enabling the engine to build higher cylinder pressure and maintain a higher volumetric efficiency as a "pump."

Your volumetric efficiency comes from cam timing, duration, air temp and humidity, and force feeding the cylinders. Air pressure is air pressure. You get more at sea level than at 3,000 ft. Adjusting the AFM flap will NOT affect VE2. It only opens faster, flooding the engine, clogging up the Cat and O<sub>2</sub> sensor (if equipped- post 79).

The air flow meter (AFM) measures resistance to the air flow by the movement of the flap. This translates to the printed circuit board inside the unit. The resistance reading that the AFM reads comes from the brass wipe strip inside. Try cleaning it with a piece of typing paper. The "Z/ZX Fuel Injection Simplified Video" showed the difference between resistance readings before and after cleaning. More resistance, less gas. Pretty simple. Do not use carb cleaner inside the unit! Electrical contact cleaner works brilliantly.

If you want to adjust when the Fi system goes to WOT (wide open throttle), on a 77-78, turn the throttle positioning switch. Hook up an ohmmeter to the wires and measure when the WOT comes in when you turn the throttle shaft. (The video shows how). There is 2 circuits in the TPS. The first measures when off idle occurs, richening the mix. The other measures WOT.

The pressure regulator acts as an accelerator pump, momentarily increasing the fuel pressure when it senses a loss of vacuum.

-Z

## Electrifying/Fuel Tech Info

Scott Bruning posted the following to the Z-Car List.

Several questions about electrical problems floating around. Let's get back to basics for a minute. I can't tell you the number of times I [have] chased gremlins around the engine bay, tearing my hair out...

Your battery connections must be perfect. No corrosion, no marginal batteries, no half-assed ground straps.

NAPA and others sell battery terminals. Welding stores sell "2 ot" arc welding cables and ends. Anybody sells a Interstate battery (get the one with the positive terminal nearest the engine.

1. Welding cable for battery cables: There is nothing better. Period. Welding cable has thousands of strands. It is as flexible as rubber hose (just like the NISSAN factory stuff!). You can get it in 2 ot size, which will carry 1000 amps @12 volts w/o problems. You can make them custom length, to fit your car.

2. New battery clamps ("terminals"). Pure lead, very cheap. These connect the cable to the battery. Clamp in the cable and be on your way.

3. Terminal ends (the end the bolt goes through). Welding stores have these, but you have to drill out the hole to fit a 9/16" bolt. They also don't have any solder in them.

"2 ot" cable is \$1.70/ft. Ends are \$2 ea. Figure on spending \$12 on a custom set as described above, about the same as a Dealer set (with smaller cables). Wiring up big stereos, I always use welding cable. Very cheap, compared to Monster Cable and the like.

Your electrical system must be right before replacing expensive black boxes. Dirty battery connections will cause your Fi to run rich, or not at all. It will cause your alternator to overfeed the battery. Someone came up with a fancy formula about electricity, I dunno the person, but it goes something

like this: If the connection is dirty, the voltage drops. Less voltage, more amperage to compensate. More amperage, more heat. More heat, more resistance to current flow. It's a vicious circle. Fi systems must have 12 volts to run. Your Fi car running funny? Feed it all 12 volts-no corrosion anywhere!

WARNING: Blatent advert below with some redeeming factors.

When I asked Kim Blough to help me shoot the "Z/ZX Fuel Injected Simplified Video", I gave him carte-blanche on content. I explained that this tape goes out to the IZCC, and we need valuable info on how to avoid mechanics bills. I EXPECTED IT TO BE JUST ON THE FI STUFF. Boy, was I way off base.

1. 90% of all cars coming into Idaho Z for Fi problems were not Fi related. Everything else must be right, before you mess with the Fi. Kim structured the video script to reflect this fact.

2. Kim started off the "Z/ZX Fi Simplified Video" explaining the pitfalls of the fuel system, then progressed to the electrical and vacuum systems. There was a method to his madness- this is the progression you should follow. Off camera, Kim told many war stories about cars that came in from other mechanic shops with an unsurmountable Fi problem. Kim usually fixed it without tuning the Fi. Please, take heed.

3. Vacuum: Cracked intake air boots, leaky vacuum lines, leaky valve cover/oil pan/intake gaskets-Does your Fi car die when you pull the oil filler cap? It better, or you already have a vacuum leak and someone has tuned it to run in spite of the leak.

4. Gasoline: Gotta have it. Mixed with water, it will do an Electrostatic Discharge Machining process on your fuel pump armature. Fuel pump only lasted a year? I'll bet you have water in the tank! BTW, the 7 pin flowmeters on the '76+ cars

# ZCCW Automotive Activities Calendar

February						
S	M	T	W	T	F	S
1	2	3	4	5	6	7
8	9	10	11	12	13	14
15	16	17	18	19	20	21
22	23	24	25	26	27	28

March						
S	M	T	W	T	F	S
1	2	3	4	5	6	7
8	9	10	11	12	13	14
15	16	17	18	19	20	21
22	23	24	25	26	27	28
29	30	31				

April						
S	M	T	W	T	F	S
			1	2	3	4
5	6	7	8	9	10	11
12	13	14	15	16	17	18
19	20	21	22	23	24	25
26	27	28	29	30		

## February 14

ZCCW Fun Run. North end folks meet at Harvey Airfield in Snohomish at 11:30 to drive the backroads to Kirkland to eat at Spuds on Juanita at 1:00. Everyone, please join us!

## February 21

ZCCW Tech Session at 1:00 at Motorworks, Ltd. 12700 Bel-Red Road, Bellevue. Phone 453-7082  
The topic will be Transmission R&R and Input Shaft gasket and Seal replacement on a '77 280Z.

## February 28

ZCCW General Meeting - 3:30 Red Hook Brewery in Woodinville.

## February 28

Nissan Datsun Sports Owners Club, Inc. 30th Anniversary black tie event. South Yarra VIC Australia

## March 28

ZCCW General Meeting - 3:30 - Lake Washington Grillhouse - North end of Lake Washington

## April 25

ZCCW General Meeting - 3:30 - Location TBD - Something in the South end. Any ideas?

## — What's Coming Up... —

### May 23

ZCCW General Meeting - 3:30 - Flying Pig Pub & Brewhouse - Everett

### June 27

ZCCW General Meeting - 3:30 - Flaming Geyser State Park - Picnic

### July 18(?)

ZCCW General Meeting - 3:30 - Red Hook Brewery - Woodinville.

### July 20-25

Fiesta de Albuquerque - 11th Annual Z-Car Convention, New Mexico

### August 14-16

Pacific Northwest Z-Car Gathering "Meeting of the MindZ." - Port Townsend  
ZCCW General Meeting - Sometime during the week-end.

### September 26

ZCCW General Meeting - 3:30 - Lake Washington Grillhouse - North end of Lake Washington

### October 31(?)

ZCCW General Meeting - 3:30 - Location TBD

### November 28(?)

ZCCW General Meeting - 3:30 - Flying Pig Pub & Brewhouse - Everett

*The ZCCW draws its calendar information from many sources. If you would like to be one of those sources and have automotive events that you would like to have included, email Michael at [msubite@sos.net](mailto:msubite@sos.net).*