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Half my life with Perl

Randal L. Schwartz



My half-life with Perl

Randal L. Schwartz

Who is this guy?

- Jack of all trades—master of some
- Programmer, writer, trainer, sysadmin, QA, networking, devops, podcaster, comedian...
- And thinner!



Intertwined

- Perl culture
- Stonehenge culture
- Randal culture
- A lot has happened
- My memory isn't as good as it once was
- Consider this presentation “a work of fiction”
- ... “inspired by actual events”
- If you disagree with my “facts”
 - ... Call for Presentations for OSCON 2014 will probably be in January :)
 - ... then you can give your own damn talk
- Thanks to Elaine and other contributors for the Perl History timeline

Bill Harp



- Integral part of “Randal Culture” for nearly 30 years
- As such, influenced Stonehenge, and thus Perl
- Friend, business partner, marketing director, production assistant, wingman
- Sadly, passed away. Bill Harp, 23 Nov 1967 to 22 Feb 2013
- I will miss him, and remember him until my final days

The child me: I like programming. I hate writing.

- Chose programming as a career at age 9
 - Wrote code for PDP-8 FOCAL language “on paper”
- Got access to HP2000 Time Shared BASIC via ASR-33 (uppercase!) at age 10
- Many hours of self-taught time with that terminal through the end of high school
 - Took over teaching BASIC from the “computer” teacher many times
 - Built an IMSAI 8080 for the school
- Flunked middle-school English
- Took Journalism in high school (for 3 years!) to avoid any real English exposure
 - Earned points for typing and page layout, not writing
 - Only serious story: “Randal assembles an IMSAI 8080 for the school”
 - As chief editor, I put it front and center on page one

Derailed to an unexpectedly good outcome

- Contract coding (\$30/hr in 1977— about \$120/hr today) at age 15
- Out of high school at age 16
- Got a summer temp job at Tektronix (largest employer in state)
 - ... as a tech writer
- Learned writing on the job
 - Organization (book and company) from Lyle Settle
 - Tech editing from Jack Falk
- Stayed in that slot for four years
 - Migrated from temp to salaried position quickly (youngest salaried, highest paid minor)
- Then a year as a programmer
 - Realized not really different... expressing an art into a medium. Oh, and meetings.

Larry Wall

- rn
 - Started on Usenet in 1981
 - Used that as my primary news reader for many years
 - Until Tek sysadmins “nice’d” it
 - Been reading Usenet with GNU Emacs (GNEWS, then GNUS) since then
 - Really enjoyed the very readable manpage
- patch
- perl

Perl 1

- Released in 1987
- Downloaded, compiled, played with a bit
 - Interesting to do, since it was quite a number of separate postings
 - Might have been the first “sharchive”
- Looked like a “super Awk” to me
- And I was already pretty good at Awk

Perl 2

- Released in 1988
- A lot more complete
- My go-to language for new tools
- Also started rewriting many of my shell scripts
 - And my GNU Emacs Lisp utilities

Trolling Usenet

- Spread the perl word in comp.unix.questions and comp.unix.shell
- Answered as many questions as I could in Perl
- Inevitably...
 - “Would someone be kind enough to provide me with a script (sed? awk? no perl please) that I could run on several hundred files?”
- So I'd show
 - The shell solution
 - The much shorter (and likely faster) Perl solution
- Recruited a lot of early Perl adopters this way

The JAPH

- Created out of boredom with near identical sigs all the time
 - Just another Perl hacker,
 - `print "Just another Perl hacker,"`
 - `print scalar reverse ",rekcah lreP rehtona tsuJ"`
 - `$Old_MacDonald = q#print #; $had_a_farm = (q-q:Just another Perl hacker,:-);
s/^/q[Sing it, boys and girls...],$Old_MacDonald.$had_a_farm/eieio;`
- The string led to nice shufflings (25 chars) and mappings (slightly less than 26 letters)
 - `$_ = "wftedskaebjgdpjgidbsmnpjgc";
tr/a-z/oh, turtleneck Phrase Jar!/; print;`
- Correcting some FAQ about this: yes, the comma must be included
- Might have inspired obfu-perl, and perlgolf

Perl 3

- Released in 1989
- I was on the alpha test team
 - Predecessor of “Perl 5 Porters”
- Inspired three features in Perl
 - Underscore filehandle for tests
 - List slice
 - Third one: wait a bit for it
- Larry’s first Perl haiku, inspired by my JAPHs:

```
print STDOUT q
```

```
Just another Perl Hacker,
```

```
unless $spring
```

Birth of a camel

- Perl2 manpage is 20 pages; Perl3 is 60 pages
- “We need more documentation”
- Larry says “ok, when I get some spare time”
- I chimed in “I can help, being tech-writer and also on alpha team”
- O’Reilly IT person (“ambar”) saw that...
 - “If you’re gonna write something, we might as well publish it”
- Wrote Larry and suggested “Pe(a)rls of Wisdom” (or was it the other way around?)
 - Thank goodness he pushed back on that :)
- We met face-to-face (Carrows in Salem), and decided we could work together
 - Sonny Malone: I don't know the first thing about being a partner

Danny McGuire: It's easy. We share the responsibilities and we argue a lot. It's like being married... without the good part

— *Xanadu*

Writing the camel

- Written in TROFF, with which I was quite experienced (production at Tek 8 years earlier)
- The “in-house” O’Reilly TROFF macros looked hauntingly familiar
 - ... because I had written them!
 - Steve Talbott took my Tek macros to Tim O’Reilly, and used on nearly every book of theirs
- No change control — book written entirely by email. UUCP-based email.
- I created the book design based on what I had learned from Lyle
 - And suggested the humorous index entries
- I also invented “Perl = the language, perl = the interpreter”
- Six months of nights and weekends
- Larry decided the book would describe “Perl 4” (by bumping 3.044 to 4.000 at release)
 - In the preface I said “but it might be 4.003 because of changes after we submit the book”
 - I was right. :)

Release the camel!

- Larry and I met for the second time at the Usenix conference in Dallas (early 1991)
 - Shared a room at the hotel (“Do you know a ‘Larry Wall’?”)
- Signed many dozens (hundreds?) of copies
 - Larry started using his special Camel stamp
- Runaway best seller
 - Tim had to rethink high volume press
 - We ran through a typical year’s print in just the first two months
- People wrote me thanking me for “finally being able to use Perl officially”
 - Darn PHBs not trusting things without printed docs

Birth of a Llama

- Solicited by a Silicon Valley company in early 1993 to teach Perl
 - Non-compete on their turf, but I could teach elsewhere
- Wrote up a course, retaining rights to all examples (I hate inventing new examples)
- Larry's daughter (Geneva?) named the `<>` operator for me (I named the `<=>`)
- Third or fourth delivery, someone says "I like the camel, but this course is better"
- Pitched a "Perl Tutorial" book to Tim
 - Got a phone call back in 15 minutes: "We've been waiting for you to follow the Camel!"
 - Fastest pitch/acceptance EVAR
- Wrote the Llama over the next six months
- Rewrote a course using mostly the same examples, but new slide deck
 - Started delivering that to Portland-area clients in parallel with writing the book
- Llama 1 was released 1 Nov 1993... a date that I shall always remember... because...

Just another convicted Perl hacker

- Confronted on the day of the Llama release by local authorities
- Ultimately in July 1995: convicted of three felonies
- Spent \$270,000 on lawyers and fines and “retribution”
 - Not counting lost work time, or lost contracts
- Bail and probation restrictions prevented me from working without documented disclosure
- Requested an exception for “training”, because I would have limited access to “secrets”
 - Granted that exception by the presiding judge
 - And thus, Stonehenge was reinvented as a Perl Training Company
 - Oddly enough, at nearly every place I trained, I was on the internal network
 - “oops!”

The once and future Perl 5

- Released 1995
- Finally Objects! I knew a bit about that
 - I had studied Smalltalk quite extensively in 1982
- Camel and Llama book (and my courses) were slowly becoming out of date
- Added a Llama supplement course to introduce Perl 5 features
 - initially 4 hours
 - eventually became the Packages, References, Objects and Modules (“PROM”) course
 - ... and the Alpaca book

Schwartzian Transform

- Answered a Usenet question in April of 1995
- I was brief in my answer, because I was on a break from teaching a class
 - It was a simple “decorate - process - undecorate” that I had used in Emacs Lisp
- Tom Christiansen later came along and:
 - (a) pointed out my bug
 - (b) described my five lines of code in detail
 - (c) named it the “Schwartzian Transform”
 - ... accidentally
- Later, people started suggesting using “the Schwartzian Transform” for things
 - Upset Tom (apparently, it was meant as a slam) and tried to rename to “Black Transform”
 - Too bad that never stuck :)
- Schwartzian Transform is now generic (ported to other languages)

Camel 2

- Released in Sep 1996
- Tom Christiansen added in to the mix
 - And Stephen Potter, who later dropped out of the project
- I served mostly as project leader and senior editor
 - My schedule was crazy at the time, so I didn't do a lot of original writing
- First Perl book to be written in pseudoPOD
 - Camel 1 was in "O'Reilly" troff
 - Llama 1 was in FrameMaker
 - All subsequent editions of Llama, Camel, and Alpaca are also in POD

The Perl Institute

- I wanted to take some of my runaway money and give back to the community
- Created “The Perl Institute” with the advice of a friend in 1996
 - Also put him mostly in charge
 - That was ~~probably~~ a mistake
- Sadly we didn’t accomplish much, and later dissolved the non-profit
 - But not until I had given up 6 figures worth of my assets
- Lesson: try not to lose 6 figures of assets more than a few times in a lifetime!
- The Perl Foundation now has this role
 - and have done much, much better than TPI did

Trolling The Salzenberg

- Chip Salzenberg: pumpking for 5.004
- Remarkably adept at fixing bugs
- “Leaving the Salzenberg on overnight”
- rc2 released (“show stoppers only at this point”)
- IRC conversation
- “Congratulations on rc2!”
- “Too bad about the coderef arrow”
- “Larry wanted it”
- “It’s a five line code change, and passes all tests”
- Later, told Chip that this conversation with Larry had happened three years before

The Gecko Book

- AKA: *Learning Perl on Win32 Systems*
- I was not informed by O'Reilly that this book was in progress
- First I knew of it was when I got the box with my 20 comp copies in August of 1997
- Funny that... I was invited for an online chat from CompuServe
- It was to be about *Learning Perl*
- Only after the chat had started did I find out that it was about the Gecko!
 - So most of the questions were about Windows
- I've never owned a machine that came with Windows... in my life
- I was often asked "how does this differ from the llama"
 - I reply "Ask Erik Olson... I wrote the parts that are the same, not the parts that differ"

The first Perl Conference

- San Jose in August of 1997
- I taught a few classes
 - and signed a lot of books!
- Eventually became... OSCON! (TPC3 was OSCON1)
- Things from that period are a bit fuzzy
 - ... so I have no stories to tell

Perlmongers

- Organized by brian d foy in New York in mid 1997
- I joined the initial formal (non-profit) board
 - Also included David Adler and Paul Smith
- Borne out of the regular meetings that the Perl users were having in New York
 - Which I would frequently attend
- New York was the flagship, but eventually the idea spread all over the world
- Meeting types:
 - Technical/Social (most common): Presentation, then bar
 - Social: Skip the boring presentation and head right for bar
 - Technical: Sit through a presentation, then some of us go to a bar anyway
 - Emergency Social: Someone we know is in town for a few days, so go to a bar with them

Effective Perl Programming

- In 1997, Joseph Hall is my primary trainer
- We co-wrote the PROM class slides together
 - Joseph developed the “PEGS” railroad diagrams for that
- He pitched a book to Addison
 - Based loosely on Effective C++
 - I helped with the pitch, having been through this before
- Target audience: intermediate and advanced Perl programmers
- I contributed my editing skills and a few pages and a preface
 - Wrote first full description of Perl’s “printf” format string

sh2perl

- On April 1st, 1998, I release sh2perl
- Came out of a joke from the llama class
- “How do I convert a shell script to Perl”
 - Lots of hard work
 - Or cheat
 - `#!/usr/bin/perl`
`system <<END;`
`[shell script here]`
`END`
- sh2perl properly handles `@ARGV` :)
- My first CPAN submission!

Perlmonks

- Started in 2000
- Meaningless points and levels for answering and rating answers of others
 - Seems to work surprisingly well!
- Except for vroom (the chief honcho), I was the top user most of the time
- Stayed pretty active until 2006-ish
- Now number 4 user

Perl Whirl 2000

- A Perl conference on a seven-day cruise to Alaska's inside passage
- 10 speakers (all the big names of the day) and about 150 attendees
- Custom (but optional) group shore excursions, like the Juneau Pub Crawl
- Inspired by "Captain Neil" attending my Perl class in 1998
 - And the Karaoke session afterward
 - See my Ignite Portland talk *Karaoke for fun and profit* for more details
- Neil has now produced 70 sailings of these cruises (about 110 events)
 - I've been on 60 of them
- Wired article (*Scripting on the Lido Deck*)
 - Bill: "A human blink tag" and "a people hacker"
 - Me: "Not a member of the educated class"

The Alpaca book

- Derived from our experience of teaching the “PROM” course
- Picks up where Llama left off
- Same style: hour-ish chapter with a few exercises and answers
- Llama is roughly 4.5 days as class. Alpaca is more like 3 days.
- Written almost entirely while sitting in Beaverton McMenamins Pub
 - After two pints (or more) of microbrew
- Initially called “Learning Perl Objects References and Modules”
 - I hated that title
 - I had suggested “Intermediate Perl”
 - “Books named like that don’t sell”
 - So the more complex title was used (“LPORM”)
- Second edition: “Intermediate Perl”
 - Sells quite well, thank you

The Stonehenge Parties

- Tradition starting in 2000 with TPC4 (OSCON2) in Monterey
- Never an “official” OSCON event
 - Bill could do it cheaper and “more flexibly”
 - Even so, Tim came to at least one of them
 - And Derrick Story started shooting pictures for the official OSCON pages
- People would make sure our Wednesday night (always!) party didn’t conflict with theirs
- Always wanted it to be the blowout party of the year
 - The Stonehenge teaching rate around \$20k for the week
 - All we needed was 1-2 new clients (typically buying multiple classes) to pay for party
- Alpaca Party
 - Live alpaca in a downtown bar
 - Easier to seek forgiveness than ask permission

Podcasting

- Met Leo Laporte on MacMania cruise in 2004
 - He didn't recognize me, and thought I was just helping "Captain Neil" out
- At one of the "ingenious" bars
 - "So what do you do"
 - "wrote Learning Perl"
 - "OMG, I'm reading that right now"
- Asked him about podcasting
 - Started Geek Cruises Newses podcast (future speakers, past seminars)
- Guest on FLOSS Weekly (episode #9)
 - Then podfade... I took over after episode 17
 - Started first as co-host, and now show-runner
 - Just taped episode 258 earlier today
- Often more recognized for FLOSS Weekly than for the books!

The columns

- Unix Review/Performance Computing (shorter, more general knowledge)
- WebTechniques (web focus)
- The Perl Journal (a bit more technical)
- Linux Magazine (longer, more sysadmin focus)
- Every magazine now dead
 - My columns kill magazines!
- 255 in all
- Every article is online
 - When I google for solutions, I often land on my own articles
- Some of the better ones gathered for “Perls of Wisdom” (published by Apress)
 - “the articles are the perfect length for a book kept in the smallest room of your home”

The Big Finale

- Thank you to
 - the Perl community for allowing me to share and receive in a truly potluck manner
 - the Perl developers and CPAN contributors for writing industrial-strength code
 - my clients for choosing Perl, and often choosing to let me contribute back to the CPAN
 - my Stonehenge folks for delivering reputable, consistent results
 - Bill Harp for influencing me and thus Stonehenge and Perl
 - Tim O'Reilly and crew for publishing my books and managing these conferences
 - and y'all for letting me share these stories of half my life with Perl with you
- But most importantly to
 - Larry Wall, for being brilliant at designing and implementing a tool
 - ... that he himself could use ... for everything
 - ... and sharing that with the world
 - ... so that we could get stuff done while having “an appropriate amount of fun”