# **Gothic**

Mark Bernstein
Eastgate Systems, Inc.
134 Main Street
Watertown MA 02472
+1 617 924 9044

Bernstein@eastgate.com

Stacey Mason
Eastgate Systems, Inc.
134 Main Street
Watertown MA 02472
+1 617 924 9044

smason@eastgate.com

### **ABSTRACT**

A kindergarten chat [42] about the digital gothic, Kolb's story/story [16], fractal hypertext [13], and some very thin (and unemployed) characters.

# **Categories and Subject Descriptors**

H5.4 [Hypertext/Hypermedia]: Theory. 17.2 [Document Preparation]: hypertext/hypermedia. J5 [Computer Applications]: Arts and Humanities. *Literature*.

### **General Terms**

Documentation, Design, Human Factors,

# **Keywords**

Hypertext narrative, criticism, economics, publishing, fiction.

## 1. INTO THE GARDEN

Suw: Are you sure it's safe? It's past midnight. My guidebook warns travellers to be especially careful after dark.

Lou: The moon is full. Yes, there are some clouds, but...

Suw: It is a dark and stormy night. Try to remember: winter [25]. And if on a winter night a traveller... [11]. The book says specifically to stay out of the Hypertext Gardens [29] after dark.

Dru: Your guidebook was published in 1987.

Suw: Which is why I can read it — or *could* read it, if there were any light. Unlike Lou's book, which is somewhere in the cloud. So, when our train crossed the border and they had to turn off the wift...

Lou: I'm sure it will be fine. And think! Here we are, in the famous hypertext gardens of L'Hav.

Mehta: It is not Jan Morris's *Hav*, but then, *Hav* is not what it was before the revolution, either [38].

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Dru: It must be very pretty in the sunlight. Playful children, lovers talking earnestly in the cafés, families together on an outing.

Is someone watching the time? Suw has a point: if we get lost we could miss our train[4].

Mehta: Don't worry. The train won't leave for nearly five pages, and the station is so brightly lit that you could see it from Sarajevo.

Suw: Why not just wait there? It's a clean, well-lighted place [23].

Lou: It's an ugly postwar rail station, filled with advertisements for German cosmetics and Ukrainian liquor. Besides, I've been reading Spuybroek's *The Sympathy of Things* [41]all the way from Dusseldorf. I need a break to sort things out.

### 2. SMALL PIECES

Dru: It's remarkable when you think about it: a famous public garden, right next to the train station. They've somehow been able to resist the real estate developers all these centuries.

Suw: Most of it used to be the ghetto. That's where the garden wall comes from. All this was filled with six, seven-story walkups with no plumbing and plenty of cholera. You can see them in the shadows: an old man shrinking with fever on the floor, and about him dirty brats, tattered brats, hilarious brats [27].

Lou: After the war they made a clean break. The bombs cleared away the tenements. They kept the ruins of the ancient church.

Mehta: UNESCO wouldn't let them get rid of it, the preservationists wouldn't let them rebuild it.

Lou: Well, it was an important example of early Gothic. And it's better to have the real building, even ruined, than some simulacrum. The 19<sup>th</sup> century preservationists did a lot of damage.

Dru: So, this book by Spuybroek you're telling us about. It is about "the digital nature of the gothic?"

Lou: That's the first chapter.

Dru: Computers need pointed arches and stained glass?

Lou: A lot of humanists get caught in essentialist ideas about ones and zeroes, or at any rate with old-fashioned models of computation drawn from the COBOL era [28], but Spuybroek's idea of the digital is something computer characters like the four of us would recognize: small pieces, loosely joined, participating in emergent behavior [43]. His vision of computation is very nearly computational grammar.

Dru: And this is gothic?

Lou: It goes back to Ruskin [40], in an argument that is as much about the politics of work as it is about old buildings. Ruskin says that the gothic has six characteristics: savageness, changefulness, naturalism, grotesqueness, rigidity, and redundance. The key seems to be changefulness: using the complex behavior of those small pieces to generate large and complex things, all of them different but all equally obeying a common internal logic — all of them equally *right*.

Suw: Like Joyce's hypertext vision of a novel that would change every time you read it [3; 24].

Mehta: Or like you and me, I think. We are small – you, Suw, are especially thin – and we are loosely joined. There is nothing to stop the reader from moving from this point to the last section, then on to section five.

Dru: Is that permitted?

Mehta: It has always been permitted, and readers have always done it [30]. We are such stuff as dreams are made on; glyphs on paper, nothing more. Most of what we are, the reader supplies [2].

Is the reader now supposing that I was born in Mumbai? It is so! Does the reader imagine me to be very handsome indeed, with a lovely voice and an excellent scholarship? I am very grateful, and the reader is not wrong.

Suw: But the next reader might suppose that you were born in Berkeley and are too theoretical and choose your clothes badly.

Mehta: And it is so again! The reader is powerful indeed [18]. But of course there are limits; even the reader cannot make us talk about shoes, ships and sealing wax.

Dru: As Mehta says: we are stardust; we are golden.

Suw: And we've got to get ourselves back to the garden.

### 3. TOO SMALL?

Dru: So, small pieces, loosely joined. But there are so many distractions, just a link away. Isn't that going to distract the reader?

Lou: Wherever you read, there are all the distractions in the world. They have always been there.

Dru: But won't links interrupt the perfluent dream [19] of immersive reading [10]?

Lou: Of course not. That goes without saying.

# 4. BREAKING, JOINING, SAVAGENESS

Lou: If we're worried about flow, we can blend the pieces, connecting them with graceful transitions. Or, the reader can supply those transitions. A film cuts instantly from shot to shot; we experience these fragments, recorded at different times, seen from different places, as one continuous action [35] [32].

Dru: But doesn't each interruption threaten to lead us to some new distraction? To check email or read the last hour of Twitter? Nick Carr [12] says that, thanks to the Web, kids today have no attention span.

Lou: Everyone knows no one can concentrate anymore. That explains the commercial failure of the Harry Potter story, which runs to many thousands of pages in print and 19 hours, 38 minutes

on film. As opposed to the good old days when Warhol made headlines with "Empire," which ran for eight hours.

Dru: I walked right into that. But still: if we have lots of little lexia, and they connect in lots of ways, how are we going to polish all those transitions?

Lou: Spuybroek takes us back to Ruskin's quality of "savageness." Ruskin abhorred industrial production. The infinitely extended reproduction of identical objects, all equally polished and equally banal, is "slave's work, unredeem'd." The medieval architect couldn't demand this; all the piers might be required to have the same height, because otherwise the structure would not stand up, but each capital could be uniquely the work of one mason's hand. This means that some capitals would be better and some worse. All of them, being made by hand, would be imperfect. Ruskin argues that this imperfection is not a flaw or a fault<sup>1</sup> [40]. "If you are to have the thought of a rough and untaught man," he writes, "you must have it in a rough and untaught way." It is a far better thing to have that thought than to be lost in a maze of mass-produced objects, all alike, all thoughtless.

Dru: So we don't work on transitions after all? We just smash one passage into another through a link, and leave the reader to sort it all out?

Lou: I think the point is to do what you can, and accept what you must.

Mehta: Good advice at all times.

Lou: But I think those masons give us a clue. Let's think about those capitals, each carved with its own bundle of acanthus leaves or grimacing kings or cheerful saints. What are capitals for?

Suw: To hold up the floor?

Lou: But the Gothic arch doesn't need them: ribs can spring smoothly from other ribs, or from the wall, or from the base of the pier if you want. But that join is a tricky thing; if it's just a little bit wrong, the error is going to show. The steeper the arch, the more a small error in siting the pier will be magnified. But put the join right above a capital, and the capital blocks our view – and gives us something else to look at.

Dru: That makes sense for architecture. But in hypertext, aren't you solving an interruption by adding another interruption?

Lou: A good objection! But it might not be as bad as it seems: all those capitals, each slightly different, each serving to mask a different, imperfect join, themselves create a cornice line, a new rhythm of linkage and proportion that runs both vertically toward the sky and horizontally down the aisle, leading our eye from pier to pier, capital to capital.

# 5. POINTS OF ARTICULATION

Suw: Your metaphors are piling up into your own little cathedral. Be practical: how is this supposed to work on the page?

Lou: We are familiar with the rhetoric of arrival and departure [26] embedded in the Web, of course. Everyone reads and writes with links, if only for email and Twitter and Facebook. But while the placement and framing of the link are obviously critical, we

Compare Bernstein [9]: "Recurrence is not a defect, multivalence is not a vice."

pay little attention to exactly where the link anchor should be placed or what it should say.

Should lexia stand alone as documents in the style of Intermedia and Microcosm? Perhaps lexia should end in midsentence [15] to provide greater narrative spring. This question faces everyone who writes with links, but none of the textbooks even mentions it.

Touch devices provide an opportunity to reexamine this. Are Fluid [44] animations critical, or merely nice? Should links yield, as Joyce expected, or should they be clearly articulated for "free and knowing" navigation? Should our reading be one or two-handed? Should we sit, or recline?

And think about the points of articulation where we divide our texts. In "Choose Your Own Adventure," these are critical moments in the story. In Adaptive Hypertext, these are (mostly) adapting the surface presentation to (an abstract model of) the reader's needs. In classical hypertext, these are changes in plot – in the revelation of events – not changes in story [8].

### 6. THE GROTESOUE

Dru: Look: we've reached the center of the garden, the ruins of the old church. It's beautifully lit. There's a lovely café here too; closed now, of course, but we can sit and rest a minute.

Mehta: For God's sake, let us sit upon the ground and tell sad stories of the death of kings.

Suw: You're cheerful tonight. I'll sit in this lovely lawn chair, thank you. (Pause) It's a shame it was ruined in the war. It must have been beautiful.

Mehta: Yes. Though perhaps less beautiful to the colonized: it was, after all, built in the center of the Ghetto.

Suw: But still, even in these ruins, I think you can see the thought of those rough and untaught men. And the curves of the arches are exquisite in the moonlight.

Mehta: What we don't see, interestingly, are the ruins of the synagogue.

Suw: I guess it was too badly damaged in the bombing.

Mehta: What a shame. (walking over to the ruins)

Ah, they did somehow save this *Judensau*, a carving of a Jew suckling at a pig. A charming bit of the 14<sup>th</sup> century in these delightful pleasant groves.

Suw: We can't erase the past. They wouldn't want us to. Even if it was horrible.

Mehta: Perhaps we *like* the horribleness. Look at the hypertexts: divorces, car crashes, dismembered bodies.

Dru: The classic hypertexts are fierce; even when we're not getting torn apart, we're not exactly having a good time. There's not much lust in "Lust," [1], and *Cyborg* tells us we aren't going to like this[20].

Lou: I think that's been misunderstood, too. It's not about the rupture between the nodes, the stitching together performed by links. I think it's about *intensification*. We had this new kind of writing for those tiny little screens, and the work needed to argue for its seriousness against a presumption of triviality [7]. And so we have these violent psychological crises, these ruptures and had, because they demand witness and insist on our sympathy.

Suw: All this sounds like gothic fiction: romance in the ruins, besieged by natural forces and supernatural evil and by heroic passion.

Lou: And that brings us to another of Ruskin's characteristics of gothic: the grotesque. Whether it depicts terrible pain or hilarious fun – or both: the mind behind that horrid little sculpture was not that of a good man but he was no fool. The grotesque calls us out of complacency. It makes us think. It stops us.

Suw: Which, after all, is what early hypertext needed to do. The problem wasn't immersion, the problem was rushing through, skimming the surface, and shrugging it all off.

Dru: But machines improved. Your theory would suggest we'd see fewer grotesques as the electronic page approached the familiar affordances of paper. Did that happen?

Lou: No: writers abandoned the grotesque by abandoning meaning, heading for pure form and pure abstraction. In place of overwrought emotional intensity, we travelled *From Lexia to Perplexia* and investigated *The Dream Life Of Letters*. This had always been a factor: look at *Myst* [36], a wordless hypertext about an empty world.

Mehta: This would explain why it's been so hard for characters like us to find work.

Lou: Exactly. And since the reaction against abstraction focused on aspirations for extreme immersion [31; 39], we didn't fit there, either. We're too thin.

Dru: But we don't want psychological *realism* in our stories. Realistically speaking, if we were really real, nobody would ever figure us out. Who knows what anyone is really thinking? It's our job to be just real enough: to withhold enough to be interesting, but not so much that people are as baffled by us as by their families.

Mehta: Without families, fiction itself would be impossible. And I think there's a familiar dynamic at work here too: an anxiety that the established form had been explored and colonized by authorities who would necessarily cast their successors in shadow. Shifting the ground was a pragmatic move in the literary game.

# 7. GROWTH AND GAME

Suw: You're completely missing an important change: the shift to games, the shift to social media. Everything's about exploring emergent behavior, interacting sims and interacting avatars. Though it's been hard for characters like us to get work in games, with everyone focused on Skinner boxes and reward loops.

Lou: This is where the digital gothic really gets traction. Here's Spuybroek's vision of how design should work:

In Gothic digital design, redundancy means the availability of an enormous, but not infinite, number of ribs, organized at first in row-like fashion, which are willing to interact. Usually found in opposing pairs, they are initially straight verticals that start to copy two by two, in fixed increments, when we push the start button.

... The bundle of lines will start copying in the longitudinal direction of the nave while at the same time growing upward and, as they bend inward, interlacing into a vault.

This is at once a pattern language [5] and a generative mechanism like genetic search or the blind watchmaker. If different pairs of

ribs entwine, we get barrel vaults or rib vaults. If they branch, we get star vaults or fan vaults or hammer-beams. But we always have the constraints of structure, symmetry, and site.

Suw: This reminds me strangely of a game: Jason Morningstar's Fiasco [37]. You start with n characters. Each character has a relationship with two other characters. Relationships are decorated with needs, colorful locations, and specific objects. It's a dry, formal system, but situations of great complexity fall out naturally.

Lou: It adapts to "savage" elements: the work does not collapse if one scene is banal or discordant. It tolerates the grotesque. It supports an abundance of redundance, since encounters can proliferate indefinitely, and subplots (like spires) might spring up at any point. And yet it is naturalistic: it addresses human concerns and tells humane stories in a way that, for example, codework[33] or glitch art do not.

Suw: The way your structural ribs are *willing* to interact: I think perhaps this is what guard fields [6] want to become.

### 8. FOLIATED HYPERTEXT

Lou: Combining *changefulness* and *abundance*, constrained by those old hypertext virtues of commodity, firmness, and delight: this is a very appealing vision.

Dru: But we know how ribs – curved lines – can bend and entwine when we press the start button. To do this with characters requires our machine to model the cognitive state of the character with real psychological depth [31]. That's too hard. But, short of that, we're just rehashing TALESPIN [34].

Lou: We don't need AI any more than the gothic architect needs to know how to grow tulips.

Dru: But where else can we find this abundance of potential incident? We can't ask writers to compose it.

Lou: Of course we can. And must. We don't really care what an algorithm thinks about Macbeth; we care about what Macbeth thinks about Macbeth. And also, maybe, what Shakespeare thinks.

But I understand your concern. I think it might help to reflect on the ways any episode can evolve at any moment. For starters, we know about hypertext and recurrence and that at every recurrence we can spin out recursus, time-shift, renewal, or annotation [7]].

Mehta: This year, David Kolb argues that, at any moment, a hypertext can either remain in its own frame or spin out to a meta frame[16]. So that's another move.

Dru: And, once everyone knows about and expects Kolb's modulation to the meta, *not* making the move could be as eloquent as making it.

Lou: Fractal hypertext [13] is heading in this direction as well, though its focus on a single axis might be too restrictive. In the fractal model, we only move left or right.

Mehta: But even if have an abundance of writing spaces, they're still countable. So we could formally map them back to one axis. Surely that's what Hargood et al. had in mind all along.

Lou: You're right, but even computer scientists miss the point, and plenty of novelists are not so good about the calculus of infinities. For another direction, we might look at William Wallace Cook's *Plotto: The Master Book Of All Plots* [14]. Cook was literally a hack writer: he ground out formula novels at great speed and made a nice living doing it. *Plotto* is really an index of complications: whenever convention demands that the hero be

frustrated in some way and you can't imagine what to do to the poor fellow...

Dru: Which means us – if we can even get the job in the first place. What a life!

Lou: ... you can turn to the index and find hundreds and hundreds of complications, with suggestions for preconditions and sequels. For example, 741 is "B is forced by her father to leave home and become a domestic drudge in a distant town." The author says this one is a good follow up after 223 and 676 and goes well with 743a

Suw: Doesn't this just give us more of the frigid, repetitive episodes we already have in MMPORGs? One damn monster after another, followed by a boss?

Lou: Not necessarily. First, the complications are cumulative; they mark the characters and are marked by them. Second, the complications respond to their specific context and transform the context. Anyone can chase the jewel-encrusted black bird (and everyone does), but only one man can chase it because it will explain who killed his business partner [22] [21].

Dru: Gothic fiction, it seems to me, has always been open to multiple points of view. That's a problem for hypertext, since either all the passages linked to X need the same point of view, or they need to establish the view shift, or tolerate the reader's justified confusion.

Lou: Right. But we can localize single points of view while shifting with some freedom. This is a very hot topic in current literary fiction [17]. I can't help but think that it might help to get away from boxes and lines. Why not ferns and flowers?

### 9. CRAFT/KRAFT: WORK

Suw: Have we missed our train? Are we getting lost in the funhouse?

Dru: Writing with all these complications and all this context, how will we keep track of it all?

Suw: We don't have to. The computer can; it's the sort of thing computers can do easily.

Lou: Spuybroek says, "As all craft moves toward design, all labor must move toward robotics."

Suw: The computer can manage simple variants for us. Suppose that, in some readings, the Messenger arrives to disclose some dreadful portent. What happens if we have already killed the messenger in this reading? We might omit the messenger, or we can mechanically revise the passage to attribute the message to a different agent. This is not generated narrative, but rather simple revision under the guidance of the author.

Lou: I think Spuybroek's ideas about the digital gothic apply here as well. The author fashions a flexible but sufficient framework, sets the boundary conditions, and roughs in the structure. Additional agents of greater and lesser skill – the writer when it matters, the computer when it doesn't – extend the work. And we use the machine to ornament because machines – what Spuybroek calls "our slaves of steel" – have no objection to repetitive labor without thought.

Louis Sullivan's *System of Architectural Ornament* [42] might be interesting here. Historically, no one followed up Sullivan's system because only Sullivan could draw these woven, foliated ornaments. And, even if you could do it, you'd be drawing Sullivanesque buildings, which nobody wanted. But we don't have to do that: the machine can.

Suw: So the hypertext garden might be filled with leaves?

Dru: Or flowers. Ribbons. Or skylines: remember Dieberger's Hypertext City?

Mehta: Dawn comes soon, and also the sun rises. Hypertext/hyperbaton. We should walk back to the station. And perhaps we are too tired for such difficult discussion.

Lou: I don't completely trust this idea of the digital gothic myself. Yet, much can be done here. Specifically, we really need to explore complex narrative in the presence of links. And I think we know less than we ought about finish and polish and about what the machine might abstract away without much harm. We all need work. I wouldn't mind melodrama. I wouldn't mind working in a thriller, or a romance. Yes, the last few years of gallery work and codewerk have been interesting studies, but we're characters. What we need now is a good job.

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