Hello, Referee, and welcome. I'm Luka, a gamer, just like you. Not an all-knowing author beyond the pale, just someone who wants to make the most fun games I can. In this appendix I'm going to break the fourth wall and address you as one rpg referee to another. You know, folksy like.

I run most of my games these days with a 5E rules framework, but every game and adventure uses some bolt-on rules to make it tick properly. You know what I mean. Timers. Faction trackers. Resources that run out. But these rule hacks are often not explicit, which is a damned shame as I'm all for explicit rules and implicit setting.

This appendix of rules is aimed at making running the UV Grasslands a reasonably-not-horrible experience. All of the rules are touched on in the main text, but here I've collected them and elaborated on them.

Enjoy. -Luka

Dramatis personay

Bass: that's you. You're refereeing a table-top role-playing game, probably some kind of D&D thing where you're called DM. But this ain't a dungeon, it's a steppe. Still, it's cool. We're buddies.

HEROES are the player characters. Don't call them PCs. They're not police constables. They're out for adventure, loot and revolution. Also don't assume they're good. Heroes are not good, they're excessive and over the top.

HENCHMEN are all the scruffy followers and hangers-on knuckle-dragging along with the heroes. Let them have all the henchmen they want. If players want to promote henchmen into heroes, let them. To keep things moving, don't stat them fully, just generate as required.

Usage dice aka. risk dice: *dN

Have you heard of risk dice or usage dice? They're a really cool concept that I first saw developed by David Black (*Black Hack*, v1.2, p.8) as the usage die and then expanded upon by Eric Nieudan (*Macchiato Monsters*, MMZero, p.4) as the risk die.

I use it in the narrower Black Hack sense as a die heroes roll after using a consumable game object (ammo, food, torches, charges, magic eagles,) to see if it is used up. They form a neat chain and I use an asterisk to mark them as usage dice:

A roll of 1–3 means the supply is reduced and the die is downgraded to the next lower die in the chain. On a roll of 1–3 on a *d4 the supply is expended and the heroes are in trouble.

I wanted to call them consumption (or tuberculosis) dice, but I'll go with usage dice.

How many uses in a usage die?

Assuming you keep rolling them usage dice, you'll get this much juice out of each one. The total number sums all the lower usage dice, too.

1.	*d4:	1.33 uses	
2.	*d6:	2 uses	(2.33 total)
3.	*d8:	2.67 uses	(5 total)
4.	*d10	3.33 uses	(8.33 total)
5.	*d12	4 uses	(12.33 total)
6.	*d20	6.67 uses	(19 total)

A softer way to [usage] die

The original Black Hack usage die downgrades on a roll of 1–2, this makes for a softer decay curve. I prefer the harsher *d4 that says, "this is your last shot." But, if you prefer soft, here's the curve.

1.	*d4:	2 uses	
2.	*d6:	3 uses	(5 total)
3.	*d8:	4 uses	(9 total)
4.	*d10	5 uses	(14 total)
5.	*d12	6 uses	(20 total)
6.	*d20	10 uses	(30 total)

Long-distance gritty realism

The UV Grasslands are big. They're mind-boggling and weird, sure, but first of all they are big. Vast and fucking empty. You know, like steppes are. And it's that emptiness that kills heroes, because that emptiness means there's no wishing well to drink from and no turnip farm to plunder.

Have you ever tried to run a hexcrawl from Jaca to Santiago de Compostella with 6-mile hexes? It's like 80 of the bastards! Go on, try it. Roll for encounters in every hex. I bet you'll be bored,

and so will your players. So how do you make the grasslands feel big, while not making crossing them boring? Glad you ask.

Time: weeks and weeks and weeks

Use the week as the basic unit of activity. This will drive home how far things are. Don't worry about details like miles and leagues.

Also, use the gritty realism variant (5E DMG, p. 267). Use it. It is your friend. A long rest, that really heals up the heroes, should take a week. A short rest? A day.

If you want, you can tally extra days until they hit a week, but honestly, you can handwave extra days until you get into starvation / exhaustion territory.

Traveling between locations takes about a week. Heroes check their supplies once a week. You check for random encounters once or twice a week. Hunting and foraging takes about a week. The symptoms of dysentery last about a week.

Supplies: no rations or waterskins

Tracking supplies the classic way with pounds and packs, or even with slots, is too time-consuming and boring when the heroes are slogging across a giant savanna for months. I tried. It didn't make for a fun game.

Use supply usage dice to track supplies as an abstract resource that represents everything keeping heroes alive: beer, food, bandages, tents, and toilet paper. Like hit points for traveling parties.

Heroes roll a supply usage die **once per week per party member** that isn't a quadrupedal ungulate.

Running out of supplies kills quickly. Roll a Constitution save instead of a supply usage die.
Success: hero's physical stats are reduced by 6 and hero has disadvantage to all physical checks.
Failure: hero is starving, physical stats are reduced by 9, mental stats by 6, hero is at disadvantage to all checks, movement speed is halved and hero needs to be carried over longer distances.

Repeat the roll every week without supplies. A hero dies when any stat reaches zero.

Cannibalising the expedition is the fastest way to get extra supplies. A human adds *d4 supplies, a pack animal adds *d8 supplies.

Foraging in the wilderness takes a week and each forager rolls Survival. Every success adds *d4 or *d6 supplies (50%).

Resupply in an oasis of safety takes a week and adds *d6 supplies per forager.

Making haste gives a +1 to the supply check, but also a -1 to the encounter check and disadvantage on the misfortune save.

Careful travel has the opposite effect. -1 to supply checks, +1 to encounter checks and advantage on misfortune saves.

Inventory: trucking is hard

Carrying lots of stuff long distances overland without a hover-wagon is horrible. That's why caravans trade in luxuries like silk and gold and slaves and drugs and tea and coffee. Lots of RPGs have stupid inventory systems, yet don't show how horrible carrying stuff is. So, I simplify things.

Each hero or henchman has one inventory slot.

Their adventuring or professional gear goes there. Magic skulls of memory for wizards, a year's supply of swordmaceaxes for fighters, whatever.

Supplies also occupy inventory slots. Each step on the usage chain takes one slot. So, *d4 supplies is one slot, *d6 supplies two, *d8 three. And so on.

Smart heroes have porters and pack animals.

Stupid heroes walk around in full armor and haul their supplies in sacks on their heads. A character can carry one extra inventory slot worth of stuff, but it is encumbered.

Encumbered heroes are fucked. They have a -1 to the supply check, -1 to the encounter check, have disadvantage on misfortune saves and cannot make haste or travel carefully. They also have the regular encumbrance penalties in combat. Also, from a social perspective, they look like poor people. This is bad for appearing heroic.

People, porters and pack animals

1. Human. 1 slot (1d4+1 cash per week)

- 2. Porters are tough-ass folks trained in the ways of packing and carrying stuff, preparing supply depots, and generally surviving in the wilds. 2 slots (1d6+7 cash per week)
- 3. Disposable encumbered slave, pony, mule or camel. 2 slots (50 cash).
- 4. Steppe wagon, rickety coach or swaying cart. 3 slots per draft animal (200 cash).
- 5. Biomechanical beast. 4 slots (600 cash).

People also need to eat supplies. Driving a slave with minimal supplies (saving the good stuff for the heroes) has a 60% chance of killing the slave every week. A slave that survives five weeks of this shit and isn't freed should run away with the help of some noble spirit and become some kind of wasteland paladin hunting the asshole heroes.

What about my loot?

So the heroes come across a series of beautiful crystal sculptures with diamond eyes? Why do they hack out just the eyes? Space.

Any time a treasure or item is described with fancy words, add a slot for every word. Add slots for heavy materials, fine workmanship, intricate mechanics, cyclopean architerture. Just pile them on. That statue of the *Metaphysical Insinuation of Being by the famous Jeerida the Artistique*? Six inventory slots of glorious marble and gold worth 6,000 cash to a collector. Or, gouge out the gold bits for 300 cash.

Misfortune: because fuck your hero

The concept of Charisma comes from Greek, where it referred to grace and divine fortune bestowed by the capricious (asshole) Gods. This wasn't some lame approximation of "sexyness" or "leadership potential." Nope. This was straight up divine favoritism. A hero could be a complete dirtbag, but his divine mother dipped him in god ju-ju and gave him teflon skin. Others got the plague, he came through untouched. Others got scarred, he glowed with beauty and grace.

Charisma is utterly unfair, which is why I love to use it in games as a proxy for luck. You should,

In this expedition adventure, where each leg of the heroes' journey is a week of slogging through dull and unforgiving terrain, misfortune is that spike of pure annoyance or terror that kills unlucky travelers. Like scurvy or swamp foot.

When you spot a **Misfortune** section in the text, tell your players how it's been a harrowing week with horrible food, horrible company, rain and a couple of instances of worm-infested beans. Or whatever is implied in the misfortune text.

Then ask each player to roll a Charisma check or save against a relatively easy DC (I suggest 10 or 8+1d6). Each player that fails, gets to roll on the corresponding Misfortune table.

Yup, we're Oregon-trailing their asses.

Warn your players in advance that this kind of shit will happen in the adventure. If they take precautions, buy extra supplies, and generally take wilderness travel seriously, let them use their survival skills to help their roll or something, and explain to them that "the Gods help those who help themselves," or some nonesense like that.