

1. Lasers (1): Goals, Neutral Game and Reads

- a. Both players make a decision right after a laser is fired
- b. It's harder for your opponent to react if they didn't expect a laser. This means lasering at off timings or from less obvious positions is great! (ex drop down turnaround laser from platforms tends to catch people off guard)
- c. Practice enumerating options both players have, responses to those options, and responses to those responses.
- d. Read an option every time you fire a laser but try to stay safe
- e. Don't read randomly, condition, remember that your opponent is also reacting to your options while you do this!

ex: Laser -> Laser might prompt them to dash attack next time. Next time do Laser -> Dair

- f. More in depth laser analysis:

https://docs.google.com/document/d/1672j0LfwUOqE7QM6JCJkcRSI20eFs7s-kH1_-YQ6LSc/edit

2. Lasers (2): Laser Dash dance

- a. Reactive play style. You can retreat, attack or move forward to gain space based on what they do. Laser -> dash dance baiting out a Sheik Nair oos -> punish the Nair is a great feeling.
 - i. Limitations of playing reactively like this. Can you react to sheik's dash attack? Do you give her too much space if you respect the dash attack too much?
 - ii. Dash dancing can also be proactive. Laser -> dash dance -> Nair in at a random timing is really hard for Sheik to react to.
- b. Mixups within the dash dance (short vs long, how many you do, option afterwards if they don't bite: go in, laser again, keep dash dancing, read their option and hit them as they do it.)
- c. Remember, dash dancing gives you access to a lot more options than lasering does. When you laser you commit for 20+ frames to the laser and can no longer react or threaten a Nair during this time. Lasers are powerful but sometimes you gotta know when dash dancing is more threatening!

3. Lasers (3): Laser -> Laser

- a. Make it unpredictable after which laser you'll approach. You don't want to get in the habit of always shooting 2 lasers then approaching or your opponent will punish every time.
- b. Read their dash away / wavedash back by taking space with an additional laser. Marth like to avoid approaches after lasers with Dash away -> pivot grab for example. If Marth dashes and you simply do an approaching laser, you've gained space for free!
- c. Take note of how they punish (if they punish) multiple lasers in a row. If they try to dash attack you between lasers for example, you can start to read it and do something like laser -> Dair in place.
- d. If your opponent is good at punishing approaches but bad at punishing repeated lasers, there's no need to take big risks on your approaches. Shoot lasers with deliberation and see what it is your opponent is looking to punish.

*note that higher levels every laser becomes a risk and you cannot rely on the crutch of repeatedly shooting lasers to stay safe because of threats such as powershield -> wd -> grab or sh aerial

4. Lasers (4): Options Based on Spacing

- a. After a laser your options are different depending on your spacing where you land

- b. Laser -> Shine (shinegrab, etc) is great when close but landing close can be risky!
- c. Laser -> Dash dancing is great at around 1 roll distance away (or a bit closer)
- d. Laser -> Nair stuffs oos options at around 1 roll distance away
- e. Laser -> Laser (or dash away turnaround laser) is safe when a bit further than 1 roll distance away
- f. Laser -> dash -> grab isn't fully guaranteed but works when you land close but out of shine range
- g. Laser -> jab at fairly close range is a really fast poke that will keep you safe.
- h. Note that your opponent is aware of these options. Sometimes landing at a certain spacing with a laser is enough to elicit a response from your opponent, especially if you've conditioned them to respect certain options at certain ranges.
- i. How is this exploitable? You land with a laser grab twice and your opponent is expecting this option at this range and will roll. Now the threat of the grab is there without even needing to grab!

5. Lasers (5): Falco Ditto

- a. Rock Paper Scissors (high laser vs low laser vs dash). You can slow SHL over low lasers (or simply sh Nair at them over the laser). If you opponent does this you can dash under it and shine / dash attack / grab. If your opponent is dashing you can low laser.
- i. Summary: High laser > low laser > dash in > high laser
- b. When you have laser control, laser more than other matchups and mix in dash dances less. Lasering fast is key to avoid giving your opponent the time to shoot their own laser. Falco is slow enough that you can lock him down with lasers without needing the dash dance mixup as much because he can't just rocket towards you with a dash between lasers.
- c. When your opponent has laser control, don't be afraid to give up and try to reset to neutral with a defensive option like full hop, roll, wd back. Trying to land an offensive option like laser, shine oos, turnaround Ultit CAN work but it's a greedy option and can't be your sole response to losing control.

6. Full hop in neutral

- a. Understand how many options you have while in the air to stay safe! Fast fall timing, shine stall, double jump and drift.
- b. Applying pressure, mixing up Dair (or Bair), Laser and waveland. The option to empty land -> shine is also decent as it beats the annoying spot dodge -> shine that spacies can do vs a full hop Dair (since it often results in a missed L-cancel, spot dodge shine works a lot despite seeming so scrubby.)
- c. Why is full hopping strong with Falco? (High / fast full hop, big priority hitbox below, threat even from far away (laser))
- d. When to do it? (escape pressure, when mixup when opponent is invincible, falco ditto when you lose laser control, ways to gain center stage)
- f. Helpful ppmd post on the matter:
<http://smashboards.com/threads/falco-discussion-thread.256826/page-478#post-15097372>

7. The offensive shield

- a. Consciously covering an option with shield during pressure
- b. Comes out on frame 1 and is jump cancellable, non committal, like shine
- c. Fit this in between options when approaching / attacking.

- d. Shield stop - an added benefit to the in between shield is that it controls your momentum for more precise spacing
- e. This is only useful if you are quick to act out of it. Wavedash oos and very fast shine oos / sh areal / shl oos are key. Even then it has it's limitations, make sure it has purpose when you use it otherwise you're slowing yourself down for no reason

8. A read based game

- a. Thought: "If I know exactly what / where / when they're going to do something at any point in the game, I should be able to punish."
- b. This quote goes both ways! You might think you're staying safe but if you're predictable you aren't safe.
- c. Start with a baseline set of options in neutral but constantly look at your opponent's options and tailor your options in response to them
- d. How much credit should I give my opponent?
 - i. Will they adapt to the situation that just happened? Will they think I'll think they'll adapt to the situation? etc.

9. Improving in Steps: My 3 Steps

- a. Tech Skill. Grind out movement so that you start to have every option available to you and you can match your opponent's speed
- b. Neutral Game. Learn what options beat what options so that you choose correct options and beat obvious mistakes.
- c. Reads. Start to play your opponent. Condition them and bait out moves. Now you know the counter if a move is baited and you can execute it because you have the tech skill.
- d. Having discussed this with Kira, his order is reversed but works just as well.
 - i. Find what your opponent is doing
 - ii. Find what option beats it
 - iii. Grind the tech skill necessary for that option
- e. Note: Both methods are perfectly logical yet complete opposites. There is no one correct way to learn this game so do what works for you!

10. Tech Skill Practice

- a. Tech skill practice can help immensely. From moving faster to having more confidence in your options allowing you to focus on reads more, tech skill practice is invaluable.
- b. What should I practice? Create a routine for yourself and keep it challenging but keep it relevant.

Wavelands, ledge dashes, variations in lasers (*SHL at every height, drop through platform turnaround laser, laser -> land on platform -> isai drop laser, instant dj ff double laser, ledge hop double lasers at various heights, etc*), full length wavedashes, punish game vs 20xx cpu, double / triple shines, westballz shines, late aerals and early fadeaway aerals. There is a lot to practice!
- c. How do I find enjoyment out of it? (netflix? music? skype? stream?)

11. Shield Pressure (1): Goals

- a. Read based pressure, every hit should be an attempt to read their oos option

b. Remember, your goal is to hit them, not hit their shield or pressure them. Grab is the counter to shield, other options are a counter to oos options!

i. There are exceptions to this. A small shield can sometimes mean shield pokes, sometimes your opponent ends up on their back foot for a long time once their shield gets small.

c. “Naive model” (cover the oos option they picked last time)

d. Adaptive shield pressure, play to your opponent. Will they adapt to what I did last time? What option will they choose based on different spacings?

12. Shield Pressure (2): Shine Options

a. Westballz Shines vs Multishinez vs both, what are you covering? How safe are you? If you make their shield small be aware of shield pokes via aeriels!

b. Grabs (shine grab too) beating shield directly. What do you lose to? (roll, spot dodge, fast hitboxes)

c. Shine -> wavedash back (to laser, aerial, or dash dance) Read rolls, roll ALWAYS has to be accounted for in shield pressure (frame 3 bufferable input!?)

13. Shield Pressure (3): Sh aerial Options

a. Early fadeaway aeriels

b. Early crossup aeriels

c. Late aerial -> shine

d. Late aerial -> early aerial or Utilt (no shine), these options are useful vs Falcon from behind or other characters with weaker oos options.

e. Why do aeriels? What are you covering, what do you lose to? (aeriels good vs opponent oos options, but they must be late aeriels or spaced! aeriels are also good at shield poking and moving during pressure!)

14. Shield Pressure (4): Covering rolls

a. Dispelling the incorrect assumption that rolls are bad (frame 3, bufferable, gain stage positioning)

b. Effective Feint (how to make a bait look like a threat)

i. If you dash dance to “bait a roll” too far away from them they simply wont roll until you go in for a hit

ii. solution: dash dance closer to them, empty short hop -> waveland back (this option is very underrated,) dash in -> wavedash back can often look like you’re going for a grab. These types of baits beat opponents who plan on delaying their roll until you come in.

c. Fallback plan (what if they don’t roll?) If you’ve conditioned them to stay in place then you can take advantage of that too. If a good roll bait doesn’t catch then go for the grab next time!

15. Defensive Wall: Bair / Utilt

a. Sh AC Bairs can stuff out a lot of approaches in most matchups, great way to keep a Fox off of you.

b. Be careful, it’s punishable if you miss at certain spacings and even on hit is CCable at lower %. If you hit too early it’s punishable on shield but safe if you hit late -> shine

c. Stay unpredictable, there is a lot of depth within the Bair / Utilt wall, mixup AC bairs, late bairs, timing, spacing, aerial drift, and know when to turnaround laser or sh towards them with a more

aggressive option. Ground movement still plays a big part in between the Bairs to keep them tricky.

d. Bair / Utilt are your best hitboxes to hit above you, if your opponent is coming from above, don't be afraid to turn around and face away from them.

e. Ex: <https://www.youtube.com/watch?v=a3EvVrX7jls&t=1m09s>

i. PP doesn't quite have stage control but he's able to stuff mango's approach with a Bair out of nowhere. It's not telegraphed since he's dash dancing and the big priority is enough to stop fox's approach.

<https://www.youtube.com/watch?v=a3EvVrX7jls&t=4m32s> (another example from the same set)

16. Mental Game (1): General

a. Tournament nerves (learning to reduce them AND learning to play with them)

b. Eliminating Ego (you're not SUPPOSED to win, losing is always ok, play to learn, play the game etc.)

c. Playing the long term. A loss now is ok if you improve faster in the long term

d. I highly highly recommending reading the books listed in the next two entries

17. Mental Game (2): Inner Game of Tennis by Timothy Gallwey

Online pdf:

<http://www.tinapse.ro/home/coltul-indrumatorului-coach/resurse-materiale-instrumente/W.%20Timothy%20Gallwey%20-%20The%20Inner%20Game%20Of%20Tennis.pdf>

Amazon:

<http://www.amazon.com/The-Inner-Game-Tennis-Performance-ebook/dp/B003T0G9E4>

a. Trust your inner self don't try to micromanage everything, trust your hands and instincts to execute. Observe your play without judgement and progress as you go.

b. Playing in the present. Avoid past (I shouldn't have done that I could have won by now) and future (omg what will people say if I win / am I really gonna lose to this guy)

c. Breathing exercise to get back you back in the game (observe your breathing don't try to control it, a deep breath with your eyes close when you lose a stock can get you back in the game.)

18. Mental Game (3): Art of Learning by Joshua Waitzkin

Online pdf:

http://www.nordiccentre.org/downloads/The_art_of_learning_waitzkin_josh.pdf

Amazon:

<http://www.amazon.com/The-Art-Learning-Journey-Performance/dp/0743277465>

a. Extreme focus on the basics and on the details. Understand the intricacies of little interactions. Waitzkin refers to making smaller circles / slowing down time as a way of describing the phenomenon of seeing more opportunities for decisions at times when lower level players only see 1 decision being made.

b. Soft zone aka really study your own mental state in tourney to find what makes you tick and what makes your play optimally.

c. "Making sandals" aka be adaptive to tourney conditions, "it's crowded, hot, I'm hungry" are not legit johns if you can learn to deal with them! It's fine to cite them as reasons for a loss as long as you understand that it means you have to learn to deal with it or avoid it next tournament.

d. Don't be afraid to lose! (lose to win, invest in loss!)

19. Early Aerials vs Late Aerials

- a. Early aerial is much harder to react to. When mixing up your attack timings, early aerials are the ones that will catch your opponent off guard.
- b. Early aerials lose to shield. Once you've conditioned your opponent to fear the early aerials, they will start shielding more. A sh towards them might elicit a shield and then you can mix in late aerials.
- c. Note, late aerials aren't always necessary. If you expect to hit your opponent's shield, consider empty landing and going shine or dash dancing. Late Dair still covers CC but late Nair is often just wasting time.

20. Options with Platform

- a. Waveland ff aerials in neutral / pressure can change your momentum / angle of attack in unexpected ways
- b. Jumping on a platform and fallthrough -> turnaround laser is often not as expected as a simple turnaround SHL
- c. Waveland off -> laser or turnaround laser is really fast and visually tricky, tends to mess up their normal responses to lasers
- d. Mixup from above, super late delayed aerial vs super early spaced aerial (similar mixups to full hop but with extra mixups in your timing)

21. Shield drops

- a. The defensive bait
- b. "Parry" with quick shield -> shield drop during offense. Ex: Dair them onto a platform -> shield -> they respond with a quick attack on the platform -> Shield drop Dair
- c. Shield drop -> shine, the goat oos option (shield drop -> Bair, great kill option at high %!)
- d. Dealing with people who bait out shield drops (shield drop -> dj -> waveland)
- e. Mixing in wd oos off platform -> ff and possibly full hop to retreat.
- f. Note* just because you're good at shield drops doesn't mean you should shield on platforms all the time. Shielding too much takes away drop through -> laser options (unless you're good at shield drop -> laser) and generally makes your movement less fluid.

22. Nair vs Dair

- a. Crouch cancelling (dair wins). This vs Peach, spacies and Samus Dair is often a good counter to CC heavy opponents.
- b. Startup / landing lag (nair wins). This means Nair is likely better vs shield heavy opponents.
- c. Range / priority (situational, nair wins more likely, however retreating Dair beats things like Fox Nair)
- d. Payoff (how big a punish you get) (situation, matchup / % based.) A lot of the time Dair leads to bigger punishes but not always.
- e. Conclusion? No single right answer, experiment with both and explore which one works best when!

23. Punish Game (1): Reaction-Based

- a. Knowing when reacting to DI is necessary and being prepared for it
- b. Making sure every tech chase is a conscious reaction based interaction

- c. Setting yourself up for success (choosing options that allow for more reactions ex: setup a tech chase vs knock them away)
- d. 20xx hack pack training with random DI / tech. Try to 0-death cpu without knocking them offstage for the ez edge guard

24. Punish Game (2): Read-Based

- a. When is going for a read worth it? (big payoff? small payoff for reaction based option?)
- b. Taking mental notes throughout the set and adapting. Where do they tech? Roll? Double jump out of combos?
- c. Read-Based edge-guarding, its better to cover 1 option well then to cover two options badly

25. Punish Game (3): Keeping Pressure During Combos

- a. Combo's won't always be guaranteed but it's important to keep up the pressure
- b. Can you get a read on what they do out of hitstun?
- c. Are you being decisive enough when you get a hit to maximize combo opportunity?
- d. Knowing when the true combo isn't guaranteed
- e. How to stay safe but maximize pressure. Sometimes a simple walk forward is threatening enough to make them panic as they come out of hitstun

26. Punish Game (4): Hit Confirms

- a. Reading how your opponent reacts to getting hit by a stray hit (ex: soft AC Bair).
- b. Conditioning your opponent in certain situations. (ex: bthrow -> they roll.)
- c. Always pay attention to options after a hit, then start going for reads.
- d. Every laser, full hop aerial, soft hit, Ftilt hit at low%, grab, has the potential to bait out a predictable response and result in a combo.

27. Corner Pressure: Benefits of Stage Control / Center Stage

- a. Offensive uses
 - i. They lose the option to roll back, wd back, dash dance back on your approach. Aim your hits right by the edge in case they try to be tricky with the little space they have.
 - ii. Note that it's often better to maintain the pressure and keep them in the corner rather than go in for the hit and lose the positioning to a roll, choke them out!
 - iii. Limit their options to roll, full hop, and staying in the corner and hard read their escape!
- b. Defensive Uses
 - i. Gain the ability to wd back, roll back, dash dance back
 - ii. More drift space when you full hop
 - iii. Likely gain the access to the top platform safely
 - iv. Hits knock them off stage now!
- c. Downsides? Possibly Bthrow gimps for various characters, watch out!
- d. Example: <http://fat.gfycat.com/EarlySimpleGyrfalcon.webm>
 - i. PPMD does a great job of attacking at very unpredictable timings between dash dancing and the empty sh -> waveland. m2k cannot predict the attacks to stuff them, eventually gives up and rolls but ppmd is ready!

28. Playing vs Opponent on the Ledge

- a. Be aware of their options (Ledge dash, possibly lasers, staying on the ledge etc)
- b. Pay attention to and read their options out of ledge dash, what range do you have to stand at to beat it?
- c. Maintain pressure, don't respect their ledge dash too much or you abandon a strong position. You can simply spam SHL at a safe distance or dash dance to weave in and out of their punishable range out of ledge dash. If your opponent is really committed to holding the edge consider threatening a ledge grab so they don't get too comfortable.
- d. Laser -> grab -> fthrow -> repeat is very strong vs lots of characters / players. Don't get too ancy fishing for the kill, it's ok to maintain such a strong position instead.

29. Playing vs people on platform

- a. Reading their habits on platforms. Where are they attacking you from? Do they jump around in patterns? Consider simply dash dancing on the ground to maintain horizontal spacing and wait for them to descend.
- b. Reading their jump to the platform (punish with full hop Dair for example!)
 - i. If they get to comfortable on the top platform or side platform you can go for an aggressive option such as full hop aerial or shine -> waveland.
 - ii. Punishing the "in between." Aka, punishing the transition between ground and platform play vs punishing the ground or platform play
- c. Grounded Utillt as they come down, its tough and requires a read but if they come down on your Utillt at the correct angle it's big payoff. Don't rely on this too much, if they fake drop and you Utillt you could be punished during lag. Crouch -> shine can function similarly as it beats most hits from above.
- d. Pressure on side platforms from the ground. Sh Uair reaches the platform as does Usmash (which often shield pokes.) On Yoshis, Utillt and sh Bair can reach. Sh Fair can reach the platforms at the correct spacing on most stages including BF. These options are all less committal since they don't require you to leave the ground.
- e. Sometimes it's best to just laser them on platforms either from center stage or from the other platform. Mix it in with full hop bairs / Dairs up close so they aren't sure when they can punish.

30. Recovering

- a. Hide your intentions (make it look like you're going on stage and go to the edge)
- b. Have all your options available to you (tech skill! Mangles (ahem, Squangles,) shortens, ledge techs, ledge dashes, etc)
- c. Like everything else, take note of your opponent's options to edge guard and adapt!
 - i. Everything you're about to recover, ask yourself what you did last time and what your opponent did last time.
- d. In general, shortened side B from above the edge and up B above the edge and going to the edge, and sweet spot up b from below the edge are the hardest to cover without a read from your opponent. Up b high onto stage might be easier for your opponent to punish but harder for them to convert into a kill if you're at low %.
- e. Be decisive and don't get frustrated, accept your loss when you lose a stock but learn from it!

31. Out of Shield Options

- a. Finding offense oos (shine oos, wd towards them shine, Dair / Bair oos)
- b. Finding defensive escapes oos (wd oos away from them, roll, full hop)
- c. Shielding for a short amount of time, seeing interactions quickly. Remember, shielding comes out on frame 1 and is jump cancellable!
- d. Read / conditioning based oos options based on your opponent's habits

32. Playing from the ledge

- a. Ledge dash, the go to option
 - i. Mixups after ledge dash (shine, grab, roll, Nair, turnaround Utilt)
- b. Double Lasers, when is it good / safe?
 - i. When they are far this is a go to option.
 - ii. If they are trying to jump over / crouch under lasers, be sure you can manage laser heights.
- c. Invincible side B
- d. Going to a platform
- e. (rare) coming up with an aerial, usually reacting to something they did that's laggy.
- d. Refreshing invincibility, practice the frame perfect ledge stall to mixing up the timing you come up (super underrated option).

33. Falco's Grab Game

- a. Falco is great at making opponents wants to shield. If they shield in reaction to lasers, start going for free grabs! (laser grab or laser shinegrab are great)
- b. Uthrow followups, understanding your opponents reaction (do they SDI well, always DI behind you, try to go super high up?)
- c. Bthrow DI trap (follow up: dash attack, ftilt, fsmash, laser if off stage?)
- d. Fthrow -> tech chase or off stage
- e. Dthrow: Not super useful, can take people by surprise. Potential chain grab on fox at low% but honestly Uthrow is still probably best at low %.

34. Playing vs the Powershield

- a. Do not panic! Powershield is not the end all be all answer to lasers! It is just one of many options needed to beat lasers
- b. Avoid your lasers! Shoot low laser -> sh over the powershielded laser (or shoot high laser -> dash under it)
- c. Powershield it back, it's easier because the laser is shot on your own timing (worst case scenario, you simply shield it) This really stuffs out PS -> Nair from Fox for example and most Fox's do early Nairs after powershield letting you get a shine oos!
- d. Read what they're doing out of the powershield. They don't have guaranteed followups out of it unless you get hit out of your short hop awkwardly. Most of the time they just get a mixup as if they shot a laser.
- e. Immediate shine can beat grab at certain spacings or buffer something (spot dodge / roll also beat out grab)
- f. Be unpredictable with your lasers, when you shoot them, if you see them obviously going for a PS, you don't need to shoot a laser if they aren't moving!

35. Eliminating Assumptions

a. Reference Day9 episode: <https://www.youtube.com/watch?v=9-9VLVkm8R4>

b. “If it ain’t broke, don’t fix it”

i. Don’t accept an option as the absolute answer, always look for optimizations even if your option seems good.

ex1: Laser -> Nair might a strong option. Laser -> dash, Shield -> Nair might be better in a lot of situations as it covers an extra option in between.

ex2: You might cover Sheik’s recovery with Dsmash. Dtilt might be better without risking an Amsah tech!

ex3: You might cover a tech option, but are you doing so with the best punish?

c. “If I have a damn good answer, I must be answering the right question.”

i. Remember your goals within a match. Winning the match / taking stocks is priority 1. Getting big combos, getting stage control, doing shield pressure etc, those are just tools.

ex1: Finding that your opponent can’t punish late Nair shine pressure, but he’s simply rolling out every time. Is this shield pressure worth it? Is your goal really to just stay safe?

ex2: Going for the most invincible ledge dash when your opponent is out of range of any option you can do out of it. It might be a nice ledge dash, but are you going for the best option?

d. “There is an ‘answer’ for how to get good”

i. There is no shortcut that lets you win a matchup. Study your game, find things that can be improved and optimize incrementally.

e. “There is an ‘intended’ way to play.

i. Don’t think that you must do certain things or avoid certain things in game, be open to all options and evaluate them yourself based on merit.

ex1. Is there ever a place for lasering 5 times in a row? (hint: yes)

ex2. If Westballz did something in a video, does it mean you have to do the same in those situations? (hint:no)

f. “Language is Knowledge”

i. Just because you read about an answer to an option doesn’t mean you have it figured it out

- There are very few “counters” in melee, interactions tend to be within the context of spacing / timing etc. Don’t look for a move to “counter” what’s beating you, look at the interaction with a little more depth to find a response.

ex: Falco’s Dair might beat Marth’s grab, but does it beat dash dance grab? What’s the “counter” to Marth’s grab?

36. Tricky Visual Cues

a. You want to delay your opponent's reaction time by making have to react to both WHEN and WHAT you are doing

b. Examples: empty short hop wavelands in neutral mean they can’t associate a sh with a laser. Mixing up dash dance lengths means they can’t auto associate dash dancing with a certain length. Dash -> wavedash back repeatedly functions similarly to dash dancing but messes with their visual cue. SH ff laser and SH no FF laser can mess with your opponent's timing when reacting to lasers.

- c. Try mixing up how you get into certain options. Example: you want to laser -> grab? Mixup laser dash dance grab. Laser dash wd back dash grab. Laser dash grab from various distances (note don't dash from too far away or it becomes easy to react to.) Dash dance twice -> laser and dash dance twice -> aerial is a great basic mixup to force your opponent to react to what you're doing and not what you're about to do.
- d. Jumping on a platform should not be an obvious visual cue for where you'll be in the vertical game!
- e. Recovery! If you double jump a certain place, don't always do the same option.
- f. Tech chasing! If you DI a certain direction don't make that correspond to a tech option!
- g. Example: <https://www.youtube.com/watch?v=Wsrc1tHljfc&t=11m16s>
 - i. PPMD chooses to dash -> wd back repeatedly very quickly instead of regular dash dancing. What are the pros and cons of this? (main benefit is the visual cue and off beat timing of the attack!)

37. Ground Movement

- a. Mixup your ground movement to remain unpredictable and keep your options open.
- b. Dash dance of various length. Really short quick dd followed by long dash away short dd long dash away repeat etc. Dash away from your opponent -> run -> wd back shine is a great bait.
- c. Mixing up your ground movement within your lasers makes you really hard to punish. If they don't know when you're going to laser or even if you're going to laser, you're in a good spot.
- d. Attack at unknown timings based on tricky movement and don't do the same pre-approach movement twice in a row so that there aren't any hints as to your intentions when you approach.

38. DI

- a. Combo DI, don't just hold in, think about what move they're gonna use next in their combo and make it harder for them. Sometimes a read must be done if they can trap you (ex, is sheik going to tilt or fair?)
- b. Survival DI, know when survival DI is worth going for and when you should be prioritizing escaping combos
- c. Platforms, pay attention to your surrounding and see if you can DI towards a platform to help you escape a combo. Don't get chain-grabbed in the middle of pokemon stadium!

39. Smash DI

- a. Understand the mechanics behind SDI and ASDI and find a method to SDI quickly for you
- b. Go for SDI on every hit, there's no reason not to and it's very helpful to escape combos!
- c. Recognize common situations. Ex: Fox drill / Uair. Samus Fair from ledge (SDI down -> shield!)
- d. Added benefits of total awareness, if you go for SDI on every hit, you are paying attention and reacting to your opponent's combos!

40. Advanced DI / SDI options

- a. Amsah teching, know how to do it (double stick DI) and when to use it (low trajectory moves, spacie Dsmash)
- b. No tech slide off of platforms to slide off with no hitstun! (ex, Falco dairs into platform, DI away and don't tech)
- c. Hold down and shield if you are on a platform and a Fox Uairs or a Marth Nairs. You will ASDI down onto the platform after the first hit and buffer a shield before the 2nd hit comes out.
- d. When up Bing from below, SDI into the edge and ledge tech -> side b!

e. If you're being hit across the stage, look to tech a platform on the other side!

41. Optimal Practice

- a. What's most important for you to practice? Tech skill vs video analysis vs reading theory vs practicing with someone
- b. Tailoring your own training routine, there is no correct answer here but you should know what you need the most.
- c. How to get the most out of your practice sessions (focused, direct training, taking breaks to internalize things)
- d. Helpful ppmd post on practicing on your own:
<http://www.smashboards.com/showpost.php?p=14739329&postcount=17539>

42. SH Uair in Neutral

- a. SH Uair is an underrated option to beat things like Fox's full hop -> Drill or Nair
- b. Benefits of Uair > Bair / Uttilt is that you don't have to give up as much space and you aren't committing that much (fairly low lag, hard to punish.) It also combos very well if it hits.
- c. Hitbox is deceptively good, 2nd hit of Uair will beat most approaches from directly above vs Fox, Sheik, Marth, and most of the time even Falco!
- d. How do you bait Fox to full hop drill? Often times an approaching laser -> approaching laser -> approaching Nair will elicit a full hop drill in place from Fox to beat the Nair. Try moving in the same way but do SH Uair instead, it will look like you're leaving yourself open but you will punish the full hop hard.

43. Attack Timings

- a. Make sure your attack timings aren't predictable, change it up!
 - i. This means change up if you attack after a laser, after a dash dance, how long you dash dance, where you dash dance etc.
- b. While you want your timings to be unpredictable, you also want them to have purpose. Try mixing up your timings but always try to read what your opponent will do and time your attack to cover it.
- c. Know the two extreme. If you laser -> Nair every time your opponent knows what to expect after a laser. If you laser -> dash dance every time your opponent doesn't have to show fear after a laser.
- d. More in depth analysis on purposeful attack timings:
https://docs.google.com/document/d/1zpV3u4N-NW5UoZh4UphRRU5hOOtG_8Hvv8rNnYlOpvo/edit

44. Mid Range Pokes

- a. Laser -> Jab for a safe, threatening poke that changes the timings / spacings that you normally attack from
- b. Jab is good vs shields at max range, can convert at higher % and is one of the least committal ways to apply pressure
- c. Be wary of miss spaced jabs which are punishable on shields or crouch cancels which can beat jab until very high %
- d. Ftlt / Dtlt can also be effective mid ranged pokes with potentially larger payoffs or threat zones.
- e. More in depth analysis of mid range pokes:

45. Crouch Cancelling / ASDI down

- a. Crouch cancelling / ASDI down is REALLY powerful with Falco. CC -> shine invalidates a lot of your opponent's options at low percents
- b. Pay attention to when you can asdi down. Every time you grab, may as well be holding down in case you get jabbed, falcon Naired, any soft aerals, etc.
- c. Test out when you need the CC and when you can just ASDI down. ex: vs sheik's AC fair, you can ASDI down shines until around 20% but then you slide too far unless you full CC -> shine. If you slide too far, try cc-> Dtilt or CC -> Grab if they tend to shield right after Fair!.

46. Getting tech chased

- a. How can you be most "unpredictable?"
- b. Know your options. Tech in place is significantly harder to react to than tech left / right. If your opponent is strictly tech chasing based on reaction, consider favoring tech in place.
- c. Your payoff if they miss the punish on a tech in place is bigger (tech in place shine!) For that reason, sometimes its best to sort of condition your opponent with tech right / left repeatedly then sneak in a tech in place shine, you only need one to flip the situation around.
- d. Make sure you practice no tech -> SDI up jab and be ready to SDI twice if they double jab. This is really hard for them to cover and adds a whole nother dimension to tech chasing for them to worry about.
- e. Sometimes it's best to choose your options beforehand. If you mix it up based on instinct it's likelly you mix it up in a predictable manner and your opponent reads it.
ex: tech left / right twice in a row then think "ouch, I should mix it up,"; then you tech in place and get sheik Usmash or falcon stomped because they expected it. Instead, consider saying ahead of time "this tech chase I'm teching left / right repeatedly for the whole stock no matter what. Best case scenario, you escape because they read tech in place. Worse case? You've sacrificed a stock for some good conditioning.
- f. If your opponent isn't reaction tech chasing and is going for more reads, like Falcon stomp or knee, just keep teching left / right and try to be unpredictable to avoid the big punish.

47. Video Analysis

- a. It's easy to watch a video and end up learning nothing. Go into a video with a goal or something to work on and pause for analysis as needed.
- b. Watching your own videos
 - i. It's easy to let ego get in the way. "Ugh I was playing so bad." "Ugh my tech skill is awful." "Why would I even consider that roll I'm so dumb."
 - ii. Try to watch the video with the same level of focus / intensity that you had during the match. Understand why you choose the options that you do and identify things to work on.
ex: "Oh I was scared of this Peach running at me with dash attack so I rolled. This was a panic reaction. I should realize that I'm sacrificing too much stage control / mobility to do this and try to recognize this next time.

iii. 9 times out of 10 your tech skill isn't that much worse than normal despite you feeling like you were playing awful. Don't let "I was playing bad" justify bad play, watch with no judgement, acknowledge a weakness and go practice it!

c. Watching pro players

i. It's easy to see a good option or crazy combo and say "oh yeah that was good" then move on without really internalizing the mindset that was necessary to see that option in the first place.

ii. Try watching a video with your controller in your hand and see play along, see when you would do something different and pause, ask yourself why you chose your option, why they chose their option, pros and cons of both and if you understand the situation enough. There are no wrong answers here, the analysis itself is the important exercise.

iii. Don't ever think an option isn't available to you. "Oh Westballz can only do that cause he's crazy technical." If you spot tech skill you don't have you've spotted something to work on.

48. Adaptations

a. Adaptations are possibly the most important aspect to high level melee, you must both adapt and respond to your opponents adaptations.

b. Adaptations come in many forms, generally there is a situation that elicits an instinctual response from one of the players, adaptations come in when you can resist that instinctual response and mix up your options.

c. It's important to recognize if your opponent will be able to adapt in a situation. Easiest example is recovering as spaces. If you have the option to go high or low, and your opponent covers low and you go high, did they notice? Will they cover high next time? Not only do you have to know you can change your recovery but you need to recognize if your opponent can change up their edge guards!

d. If you're getting hit repeatedly or getting your approaches stuffed repeatedly, it's likely there's a "tell," and you're approaching from the same spot repeatedly. Try to be cognizant of what triggers an instinctual response from you.

e. More in depth adaptations analysis:

<https://docs.google.com/document/d/1ERZW1NsjYpXvKrQlb9WdOg7N2FUD7z3CUdtgGcEEqVE/edit>